

FIG.1

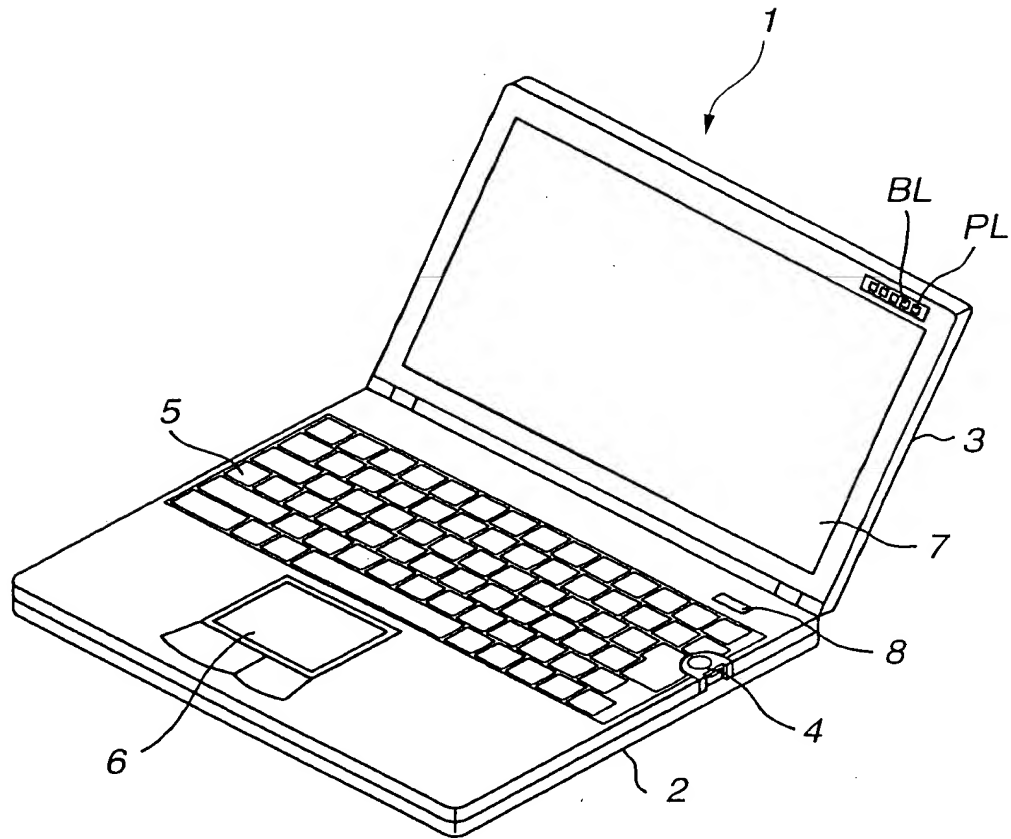


FIG.2

000150 7052900

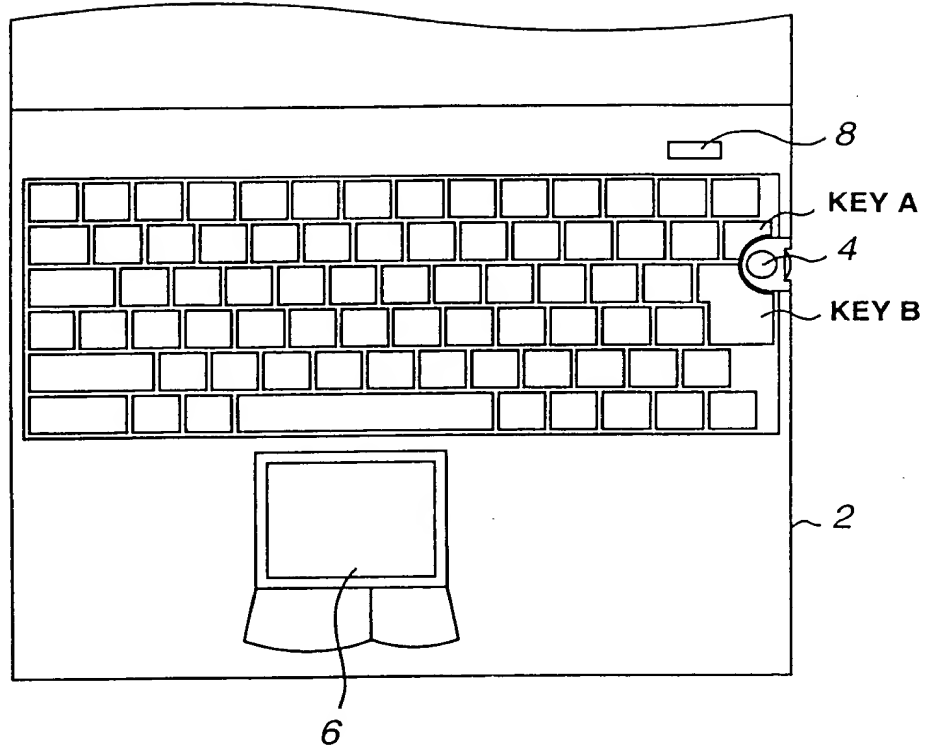


FIG.3

the 1990s, the number of people in the world who are under 15 years of age is expected to increase from 1.1 billion to 1.5 billion. The number of people aged 65 and over is expected to increase from 250 million to 450 million. The number of people aged 15 and over is expected to increase from 3.5 billion to 4.5 billion. The number of people aged 15 and over is expected to increase from 3.5 billion to 4.5 billion. The number of people aged 15 and over is expected to increase from 3.5 billion to 4.5 billion.

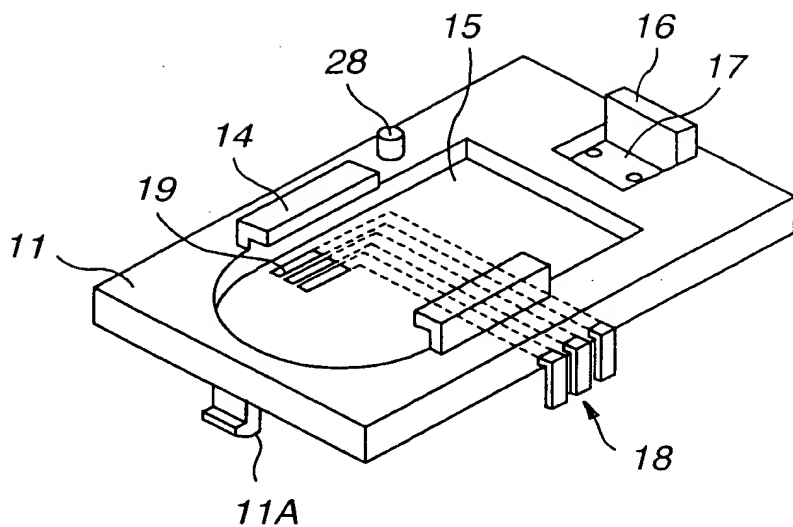


FIG. 7

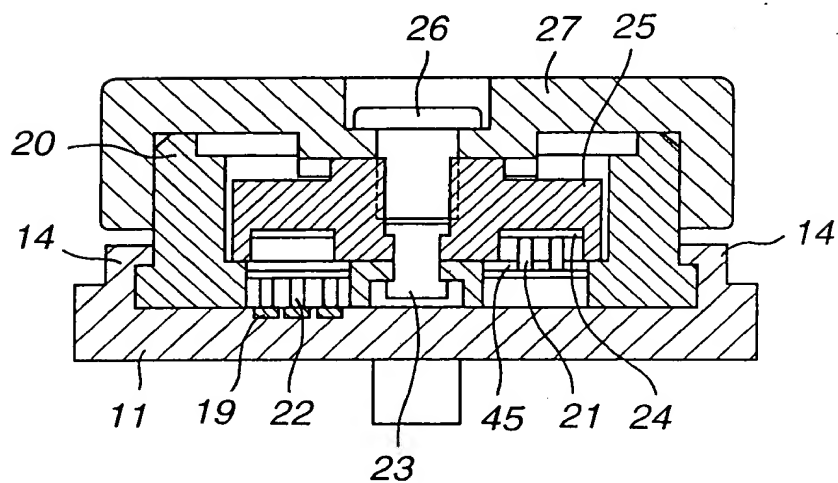


FIG. 8

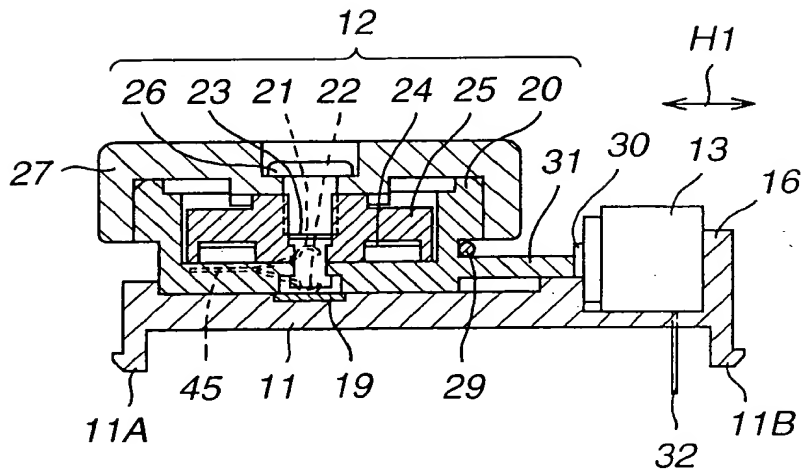


FIG.9

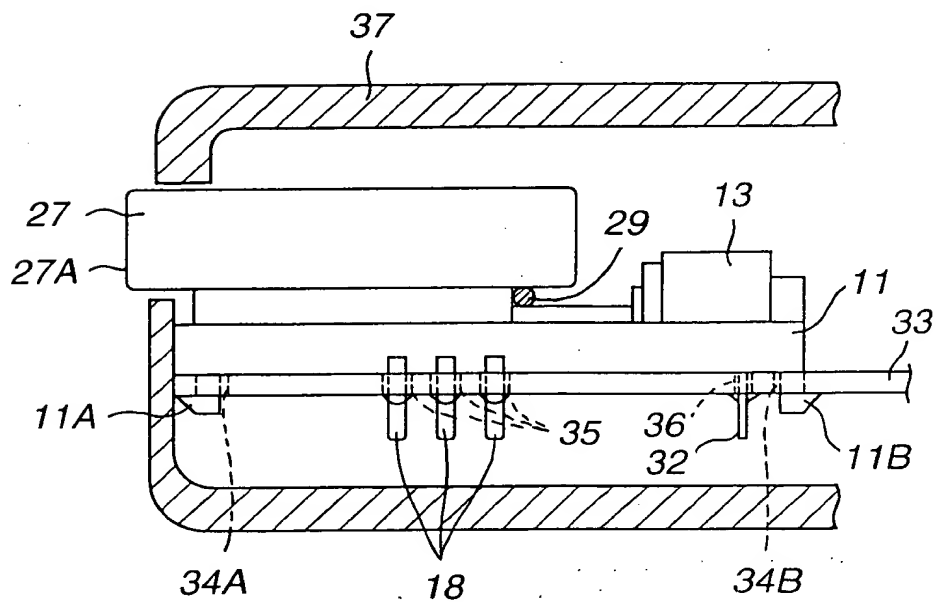


FIG.10

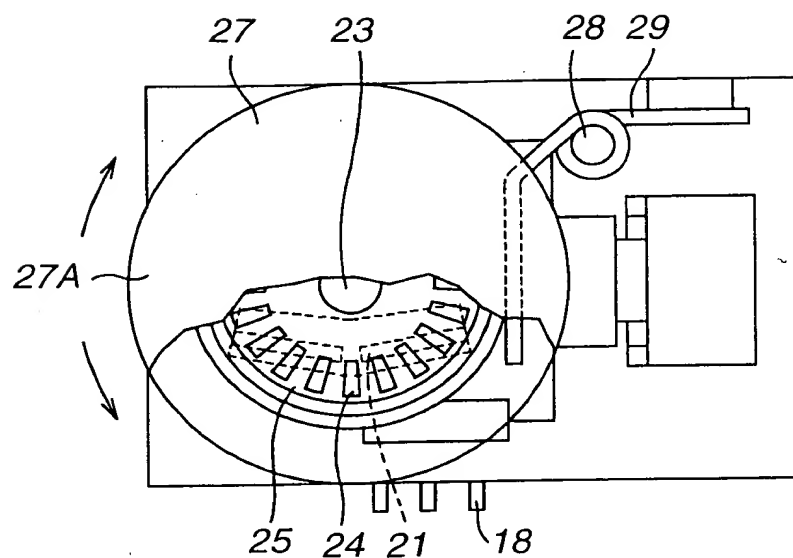


FIG.11

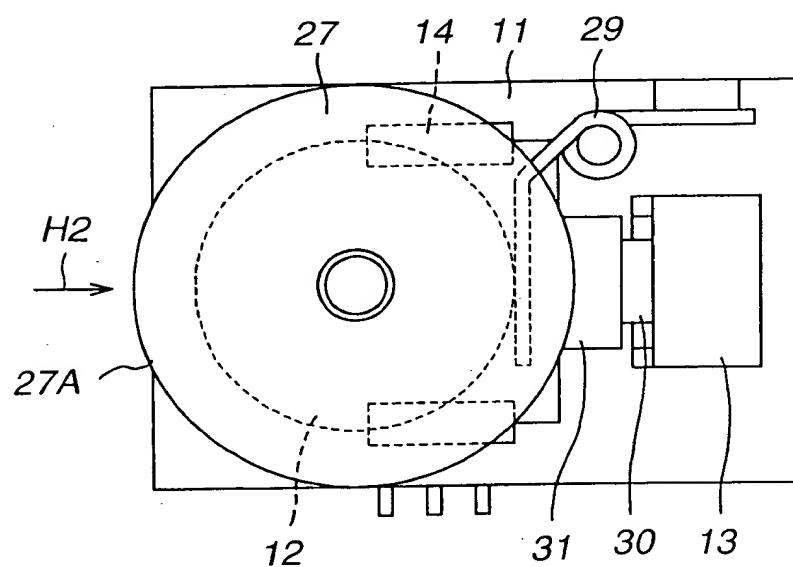


FIG.12

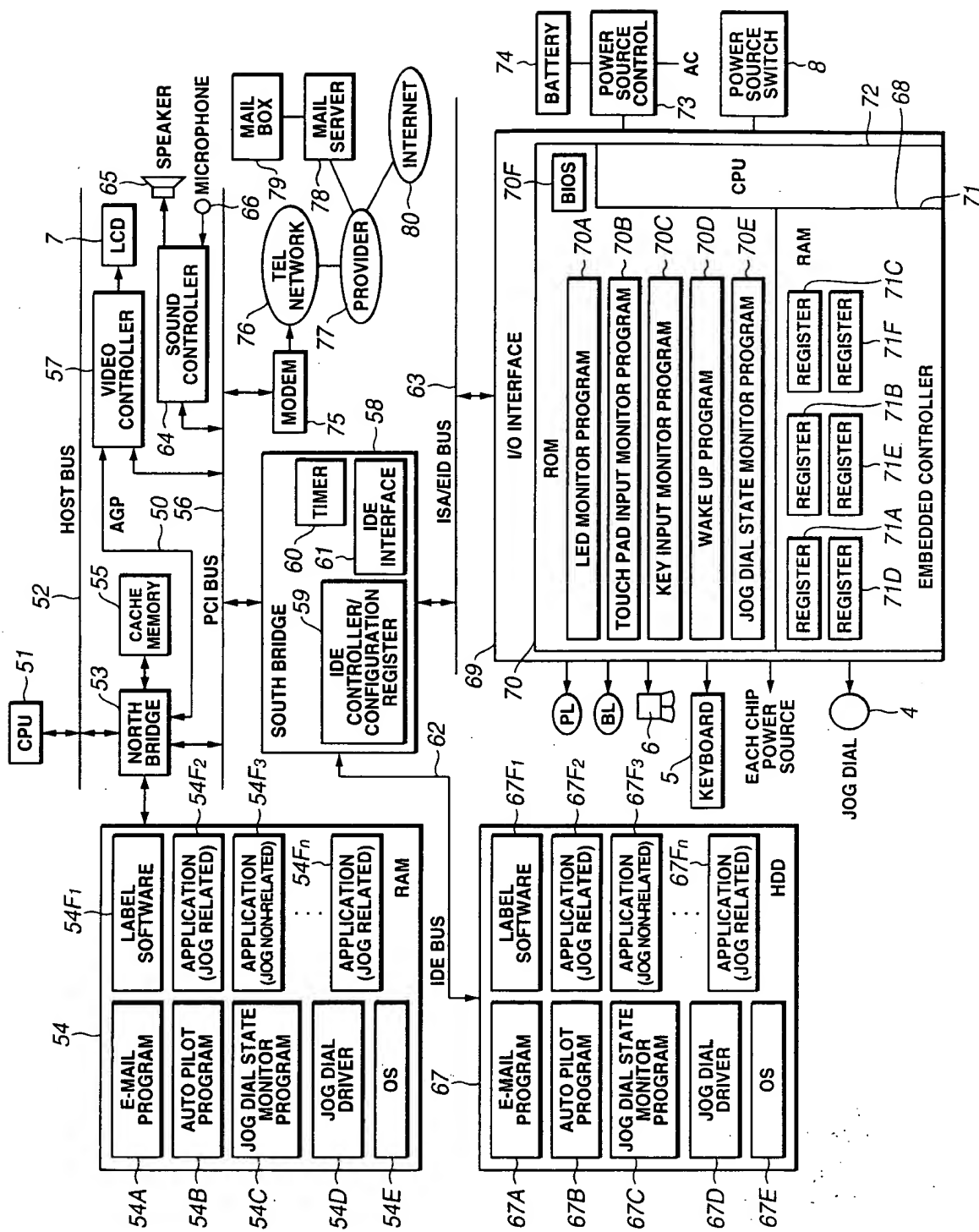


FIG. 13

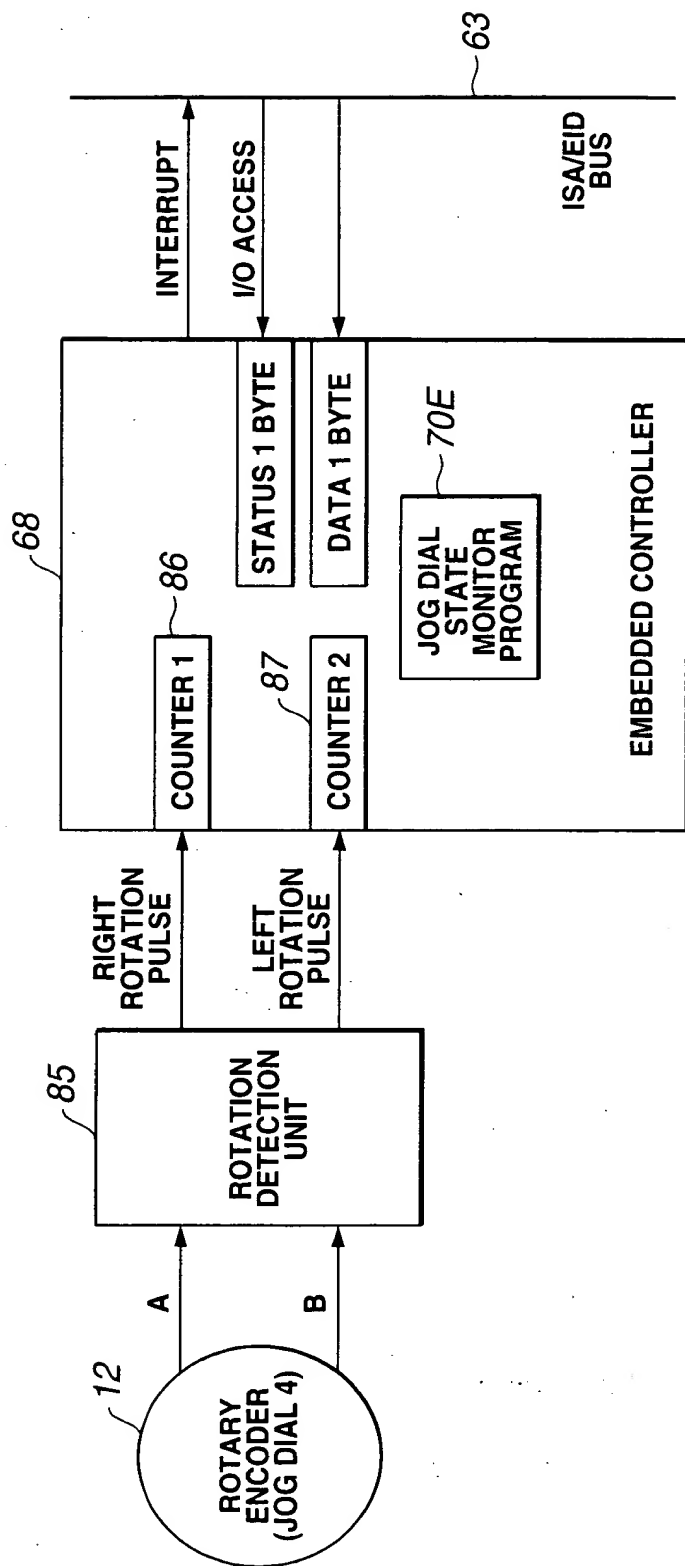


FIG.14

```

graph TD
    Start([EMBEDDED CONTROLLER  
5ms POLLING]) --> S1[COUNTER 1 VARIATION  
= Counter1(T) - Counter1(T-1)]
    S1 --> S2[COUNTER 2 VARIATION  
= Counter2(T) - Counter2(T-1)]
    S2 --> S3[VARIATION  
= Counter1 VARIATION  
- Counter2 VARIATION  
(LEFT ROTATION NEGATIVE)]
    S3 --> S4[ACQUIRE JOG DIAL PUSHED STATE]
    S4 --> S5{VARIATION! = 0 ?}
    S5 -- YES --> S6{JOG DIAL  
PUSHED STATE  
CHANGED ?}
    S5 -- NO --> S6
    S6 -- YES --> S7[NOTIFY CPU51 OF CURRENT JOG  
DIAL PUSH STATE AND VARIATION  
WITH INTERRUPT AND IO REGISTER  
TO JOG DIAL DRIVER]
    S6 -- NO --> S8([POLLING])
    S7 --> End([END])

```

FIG.15

ROTARY ENCODER OUTPUT

RIGHT ROTATION

SIGNAL A



SIGNAL B



LEFT ROTATION

SIGNAL A



SIGNAL B



FIG.16

000150 10152500

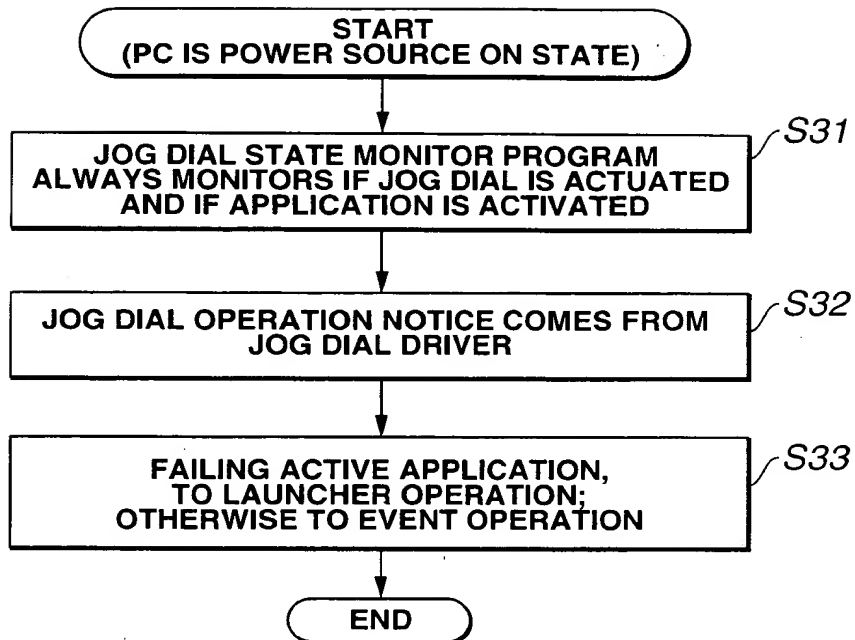


FIG.17

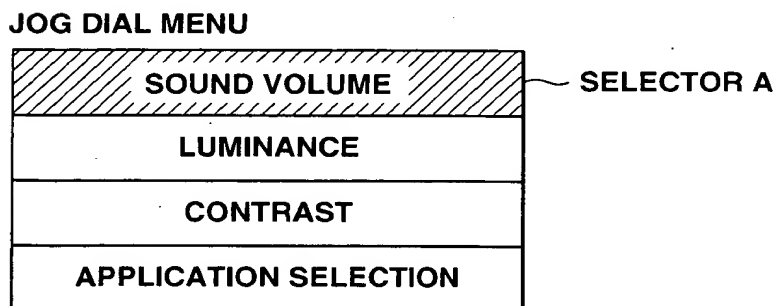


FIG.18

JOG DIAL MENU

SOUND VOLUME	
LUMINANCE	SELECTOR A
CONTRAST	
APPLICATION SELECTION	

FIG.19

JOG DIAL MENU

SOUND VOLUME	
LUMINANCE	
CONTRAST	
APPLICATION SELECTION	SELECTOR A

FIG.20

JOG DIAL MENU

	SOUND VOLUME	SELECTOR B
SELECTOR A	LUMINANCE	5 BRIGHT
	CONTRAST	4
	APPLICATION SELECTION	3
		2
		1
		0 DARK
		SUB-MENU

FIG.21

SOUND VOLUME
LUMINANCE
CONTRAST
APPLICATION SELECTION

APPLICATION SELECTION

1

**WORD
PROCESSOR**

E-MAIL

TABLE CALCULATION	
----------------------	--

INTERNET

**LABEL
SOFTWARE**

SUB-MENU

FIG.22

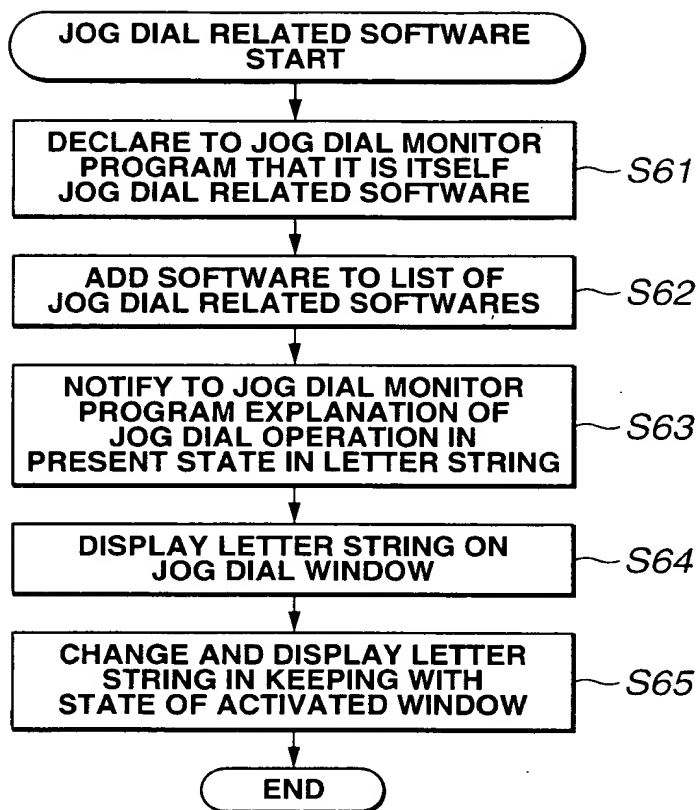


FIG.23

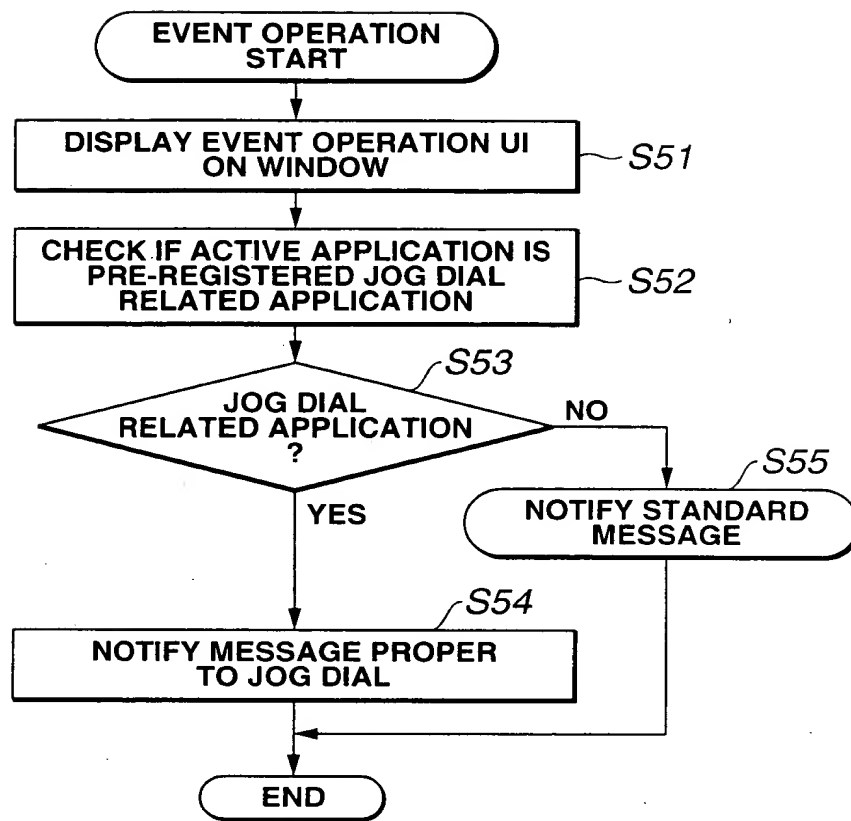


FIG.24

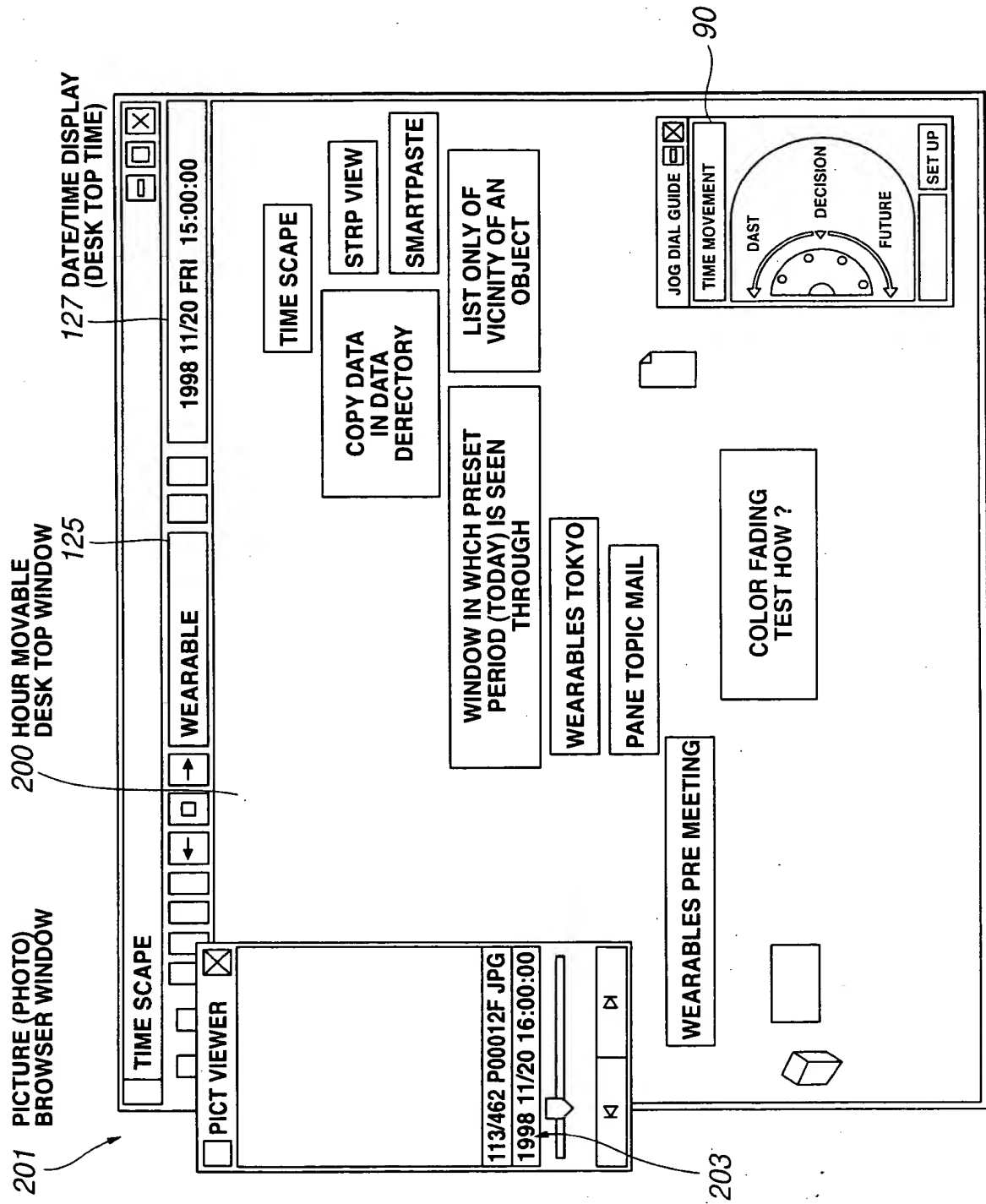


FIG. 25

JOG DIAL SETTING

?

X

SOFTWARE
REGISTRATION

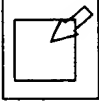

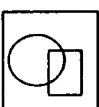
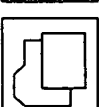
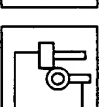

TIMER SET

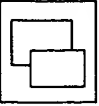
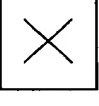
MESSAGE SET

DETAILS OF JOG DIAL

SOFTWARE DISPLAYED WHEN JOG DIAL IS ROTATED IS SET

SETTING NAME	DETAILED INFORMATION
<input checked="" type="checkbox"/> MANUAL	START ON-LINE MANUAL
<input type="checkbox"/> INTERNET	SEE HOME PAGE
<input type="checkbox"/> LABEL SOFT	ADVANCE/RETRACT TIME IN TIMESCAPE MODE
<input type="checkbox"/> SL:NEW LABEL	PREPARE NEW LABEL OF LABEL SOFTWARE
<input type="checkbox"/> SL:FRONT DISPLAY	DISPLAY LABEL SOFTWARE ON FRANT SURFACE OF ANOTHER WINDOW
<input type="checkbox"/> SL:TIME VIEW	SET LAEL SOFT WARE TO TIME VIEW MODE
<input type="checkbox"/> PICTURE MANAGEMENT SOFTWARE	ENLARGE/CONTRACT BY SHEET VIEW

OK

CANCEL

APPLY (A)

HELP

FIG.26

PROJECT

LABEL2

PREPARE-MOVE-MOVE-DISCARD

LABEL4

PREPARE-MOVE-DISCARD

LABEL3

PREPARE-MOVE-DISCARD

LABEL1

PREPARE-ADD TEXT-MOVE-DISCARD

PAST _____ **PRESENT** _____ **FUTURE**

FIG.27

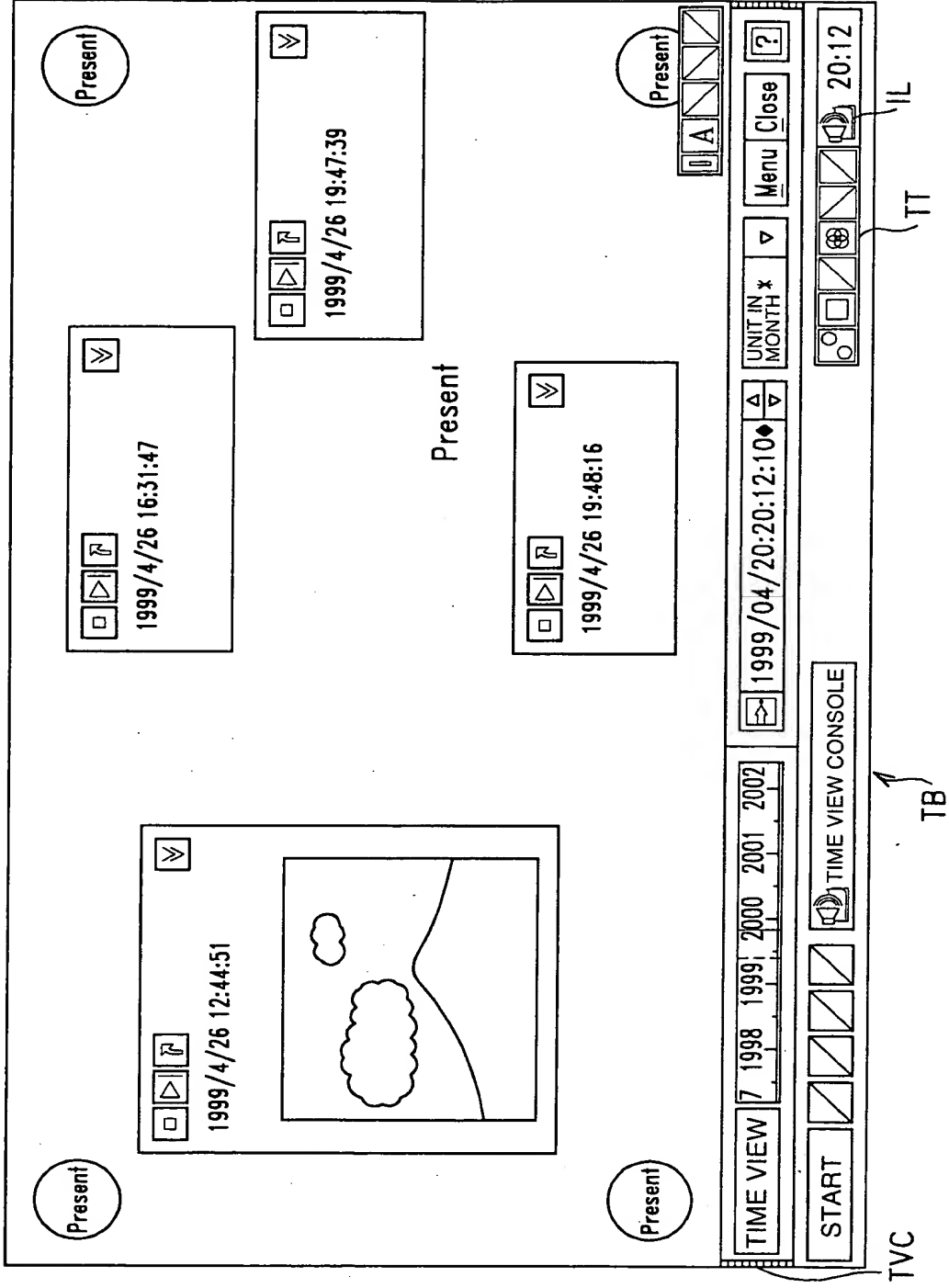


FIG.29

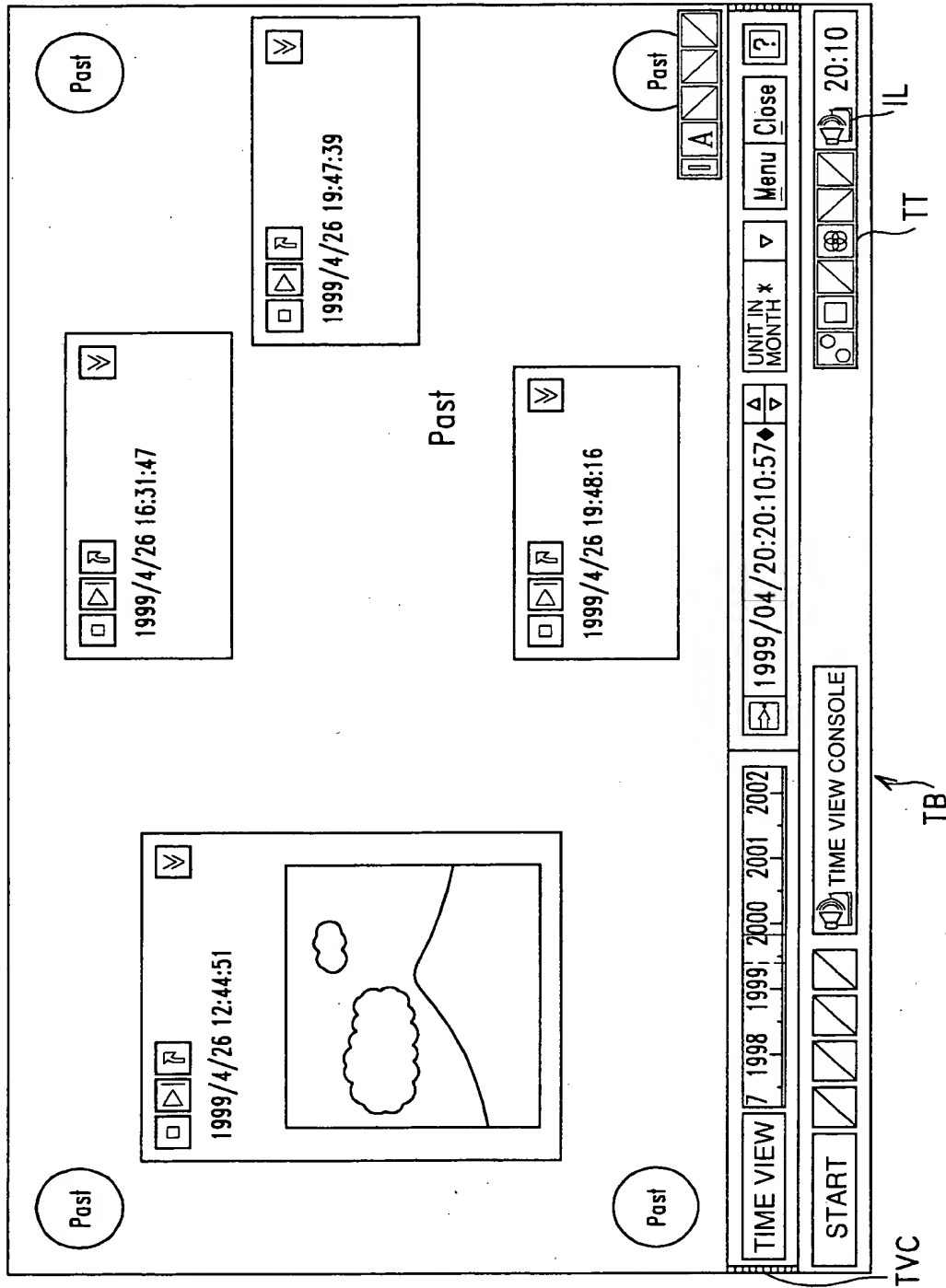


FIG.30

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100
1	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100

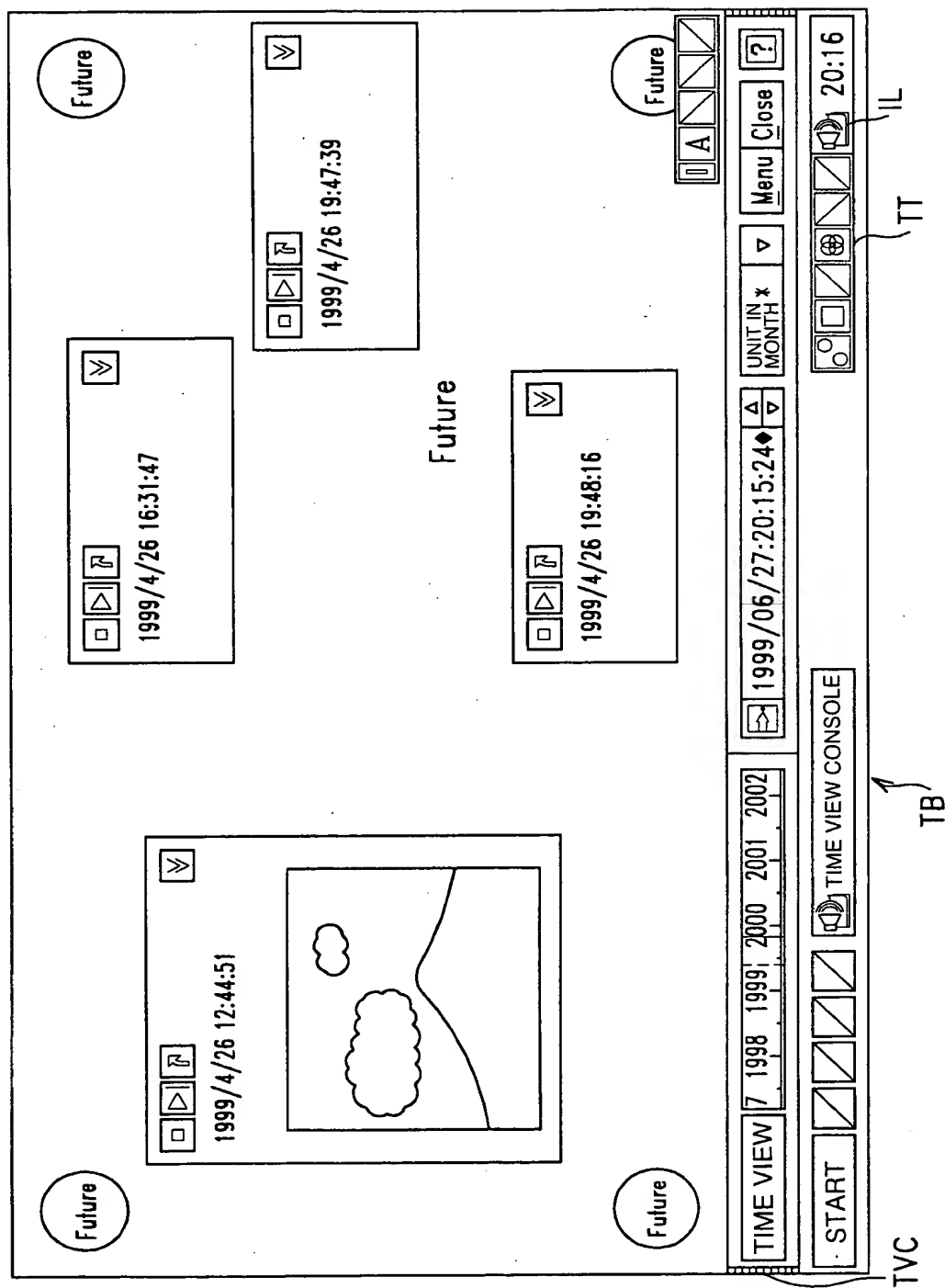


FIG. 31

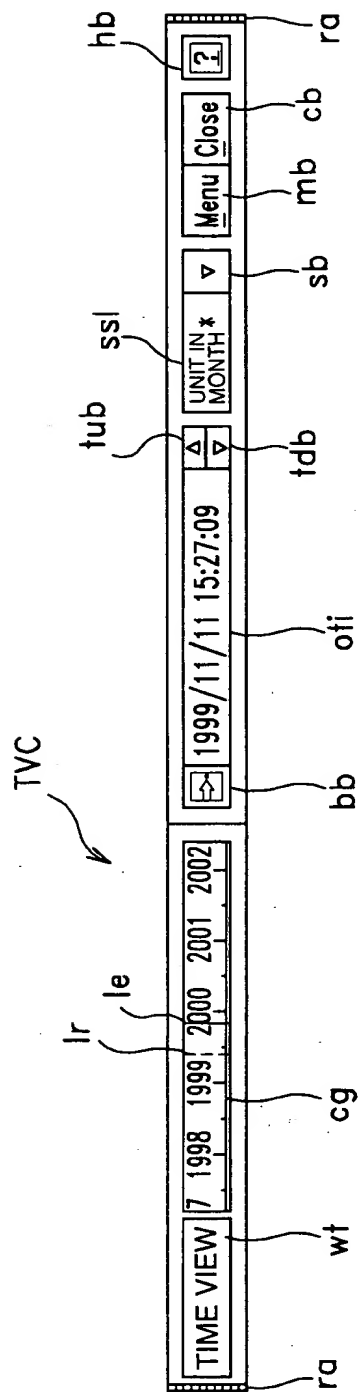
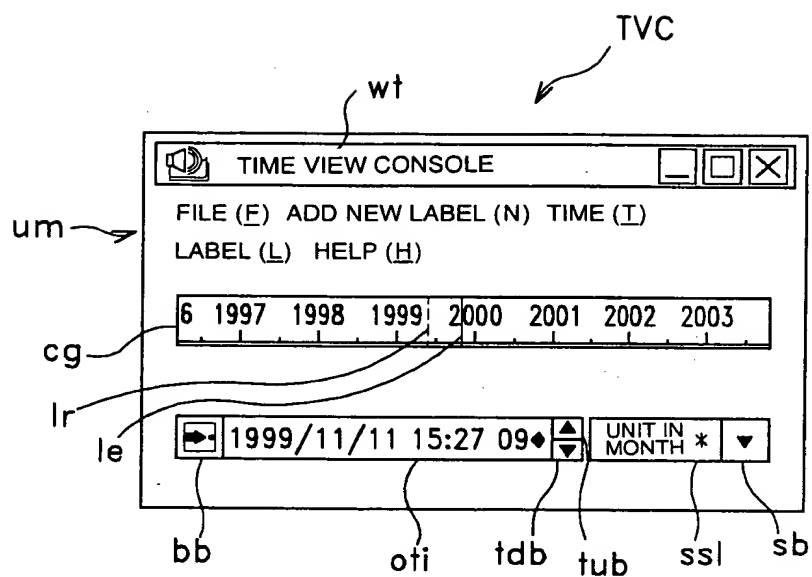


FIG. 36



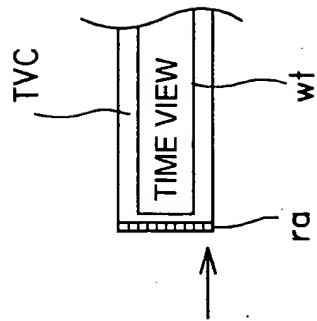


FIG. 38A

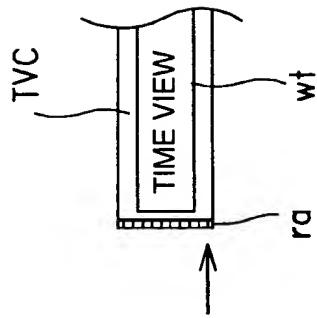


FIG. 38B

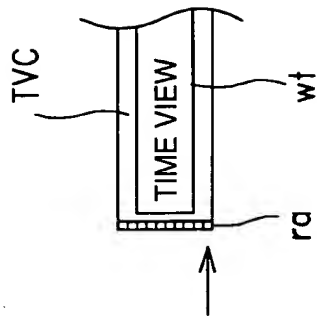


FIG. 38C

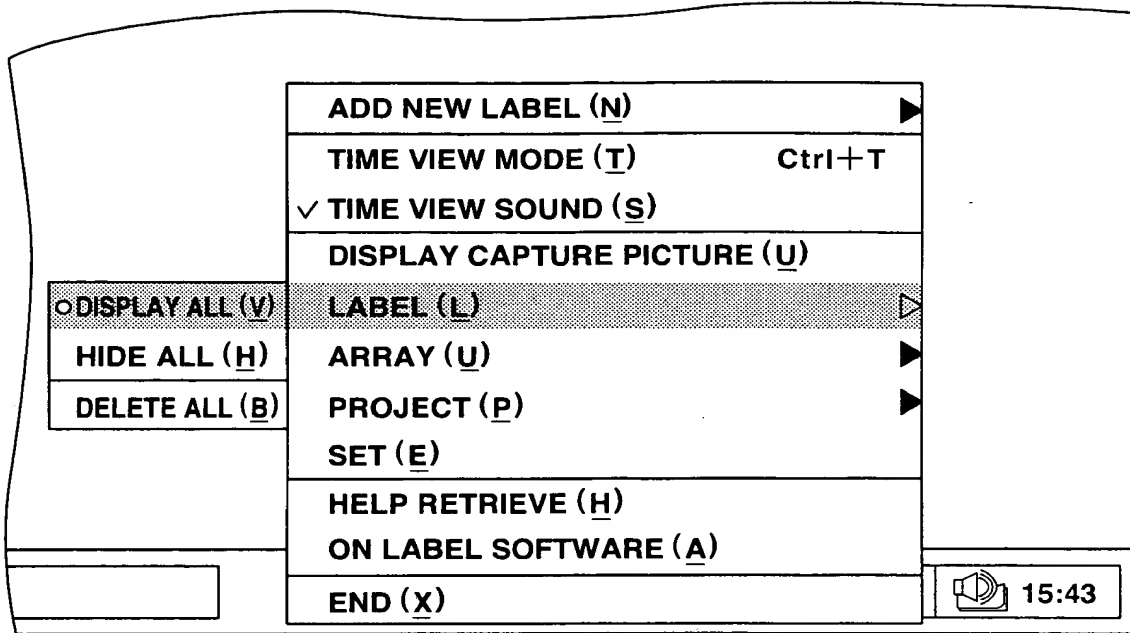


FIG.39

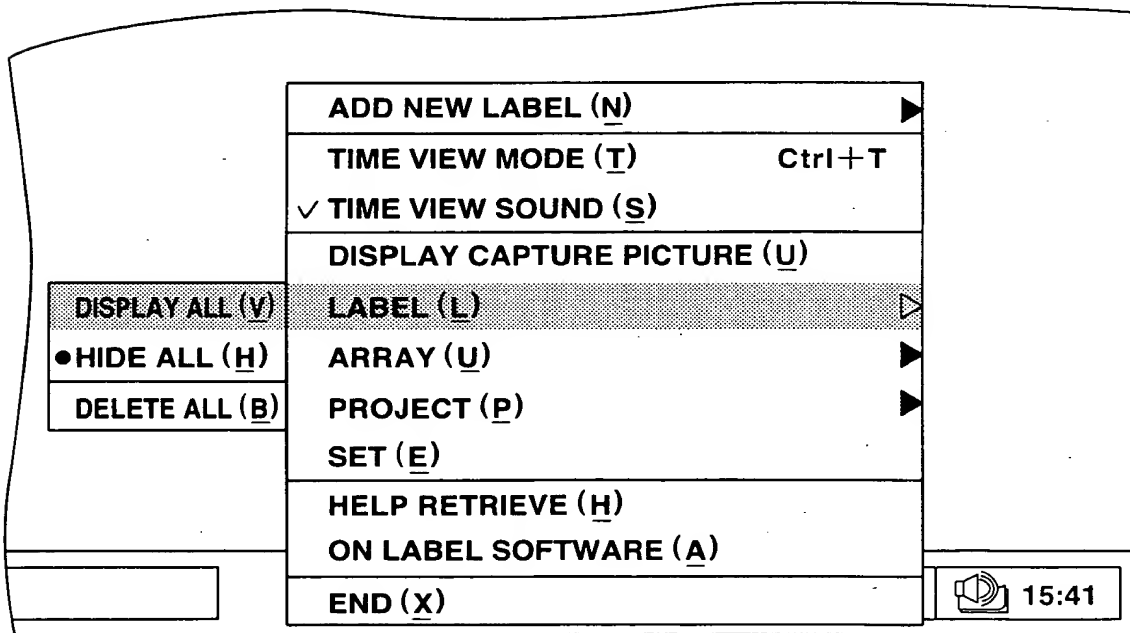


FIG.40

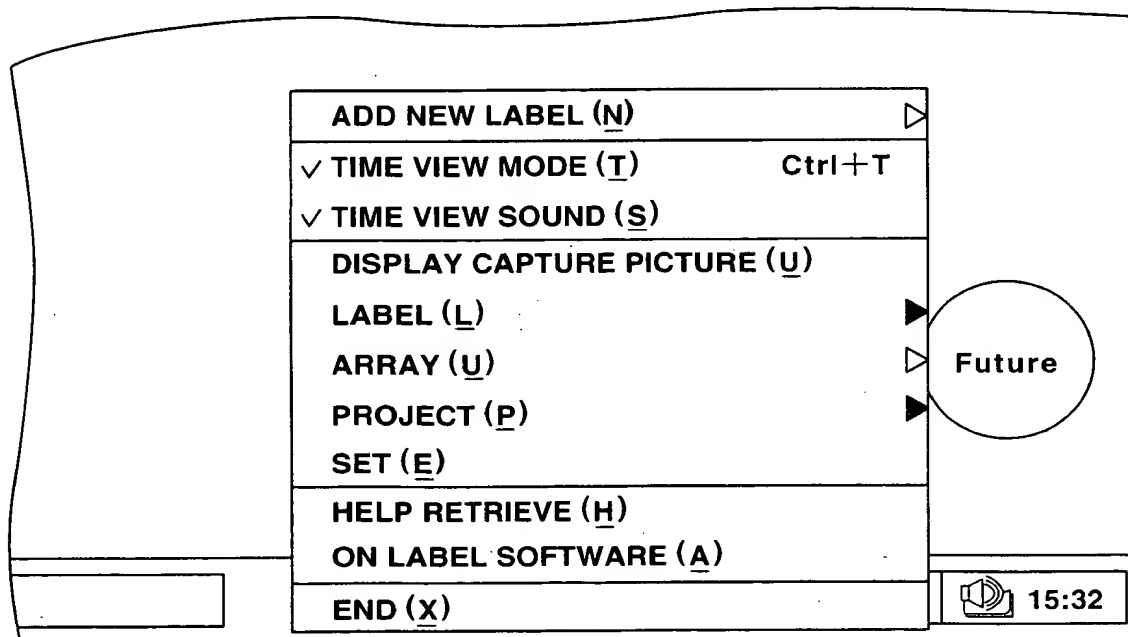


FIG.43A

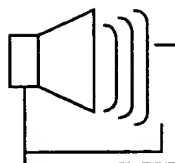


FIG.43B

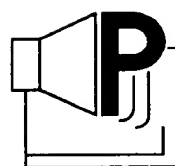


FIG.43C

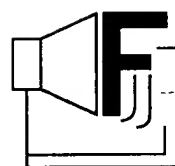


FIG. 43D


[illegible]

000050-1052500

NEW PROJECT

?

×

 ENTER INFORMATION OF NEW PROJECT

PROJECT FILE NAME (P):

SLP Data

OK

CANCEL

HELP(H)

REFERENCE(H)

PROJECT FILE NAME (P):

onyCorpolation ¥ Labelsoft ¥ SLPData

PROJECT COMMENT (C):

△

▽

☒ PREPARE CONTENT CONTAINING PROJECT

DigitalDK

▽

FIG.44

LABEL SOFTWARE QUERRIES

×

LABEL NUMBER : 12

ENTER YOUR BIRTHDAY

OK

CANCEL

ENTER AT LEAST YEAR, MONTH AND DAY

1999/04/26 15:52:46

△

▽

FIG.45

PROJECT IMPORT [?] [X]

FOLLOWING PROJECT IS ADDED TO PRESENT PROJECT -OK ?

--- PROPERTY OF IMPORTED PROJECT ---

FILE NAME:

PROJECT COMMENT (C):
 [Δ] [▽]

NUMBER OF LABELS : 13

FIG.46

PROJECT IMPORT [?] [X]

**SAME LABEL AS IMPORTED LABEL IS IN PROJECT-IMPORT THIS LABEL ?
 (COMPARISON MESSAGE OF TIME INFORMATION OF BOTH LABELS)**

☐ NO LABEL IMPORT
☐ OVERWRITE WITH LABEL OF IMPORTED FILE
☐ PREPARE LABEL COPY

☐

FIG.47

000750-105250

PROJECT EXPORT [?] [X]

EXPORT FILENAME: **REFERENCE(R)**

C: ¥ pub ¥ Test.Slp

☐ DELETE EXPORTED FILE FROM CURRENT PROJECT

☐ EXPORT ALL LABELS

SPECIFY EXPORT RANGE

1999/01/01 00:00:00 [Δ] [▽] — 1999/12/25 00:00:00 [Δ] [▽]

☒ ALL FUTURE

NOTICE : LABELS PREPARED/DELETED IN ABOVE RANGE ARE CONSIDERD

EXPORT LABELS: 13/14

OK **CANCEL** **HELP(H)**

FIG.48

000150 10132500

PROJECT PROPERTY

?

×

PROJECT FOLDER:

ta ¥ xxxxCoporation ¥ Labelsoft ¥ SLPData.Slp

PROJECT COMMENT (C):

△

▽

PROJECT PREPARING TIME:

1999/04/01 20:09:02

ULTIMATE PROJECT CHANGE TIME:

1999/04/01 20:20:09

ALL:

14

PAST:

0

PRESENT:

12

FUTURE:

2

LABEL PRESENCE RANGE:

1999/01/01 00:00:00

ULTIMATE PROJECT CHANGE TIME:

1999/12/25 00:00:00

☒ THERE ARE LABELS WITH INDEFINITE DELETION TIME

OK

CANCEL

HELP(H)

FIG.49

000050-1052500

PROJECT PROPERTY

?

×

THIS LABEL CURRENTLY EXISTS-PROPAERTY OTHER THAN START OF VALIDITY PERIOD CAN BE SET

LABEL NO.: NUMBER OF TIMES OF HYSTERESIS:

VALIDITY PERIOD:

1999/04/01 20:09:05

▲

▼

—

1999/04/01 20:20:09

▲

▼

☒ CONTINUE

☐ PERIODICALLY REPETED LABLES (PERIODIC REPETITION)

REPEAT SET

REPEAT:

▲

▼

▼

NEXT DISPLAY START TIME:1999/01/01 00:00:00

▲

▼

—NEXT DISPLAY END TIME:1999/12/25 00:00:00

▲

▼

☐ ALARM

ALARM SET

▲

▼

▼

☐ BEFORE

☐ AFTER

ALARM TIME : 1999/04/01 12:00:00

OK

CANCEL

HELP(H)

FIG.50

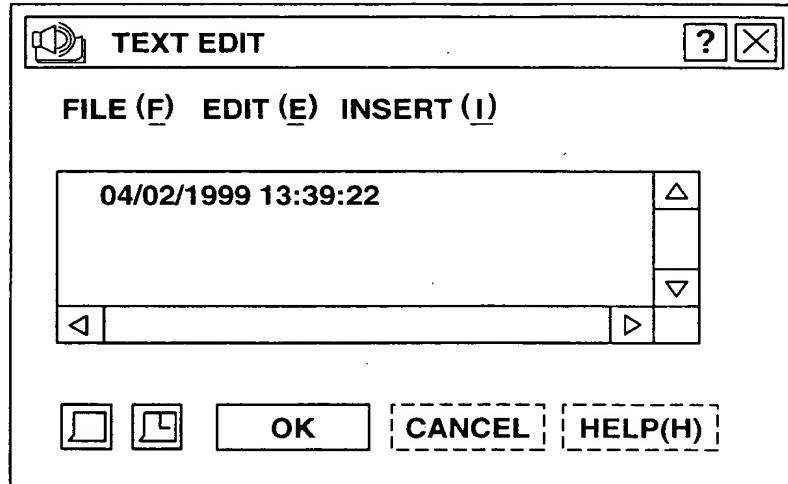


FIG.51

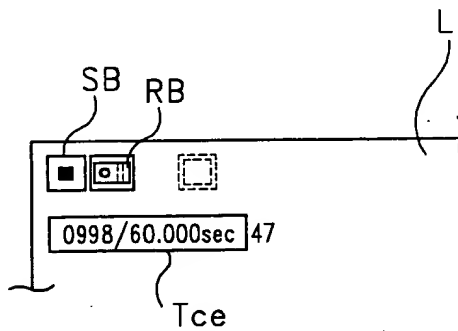


FIG.52

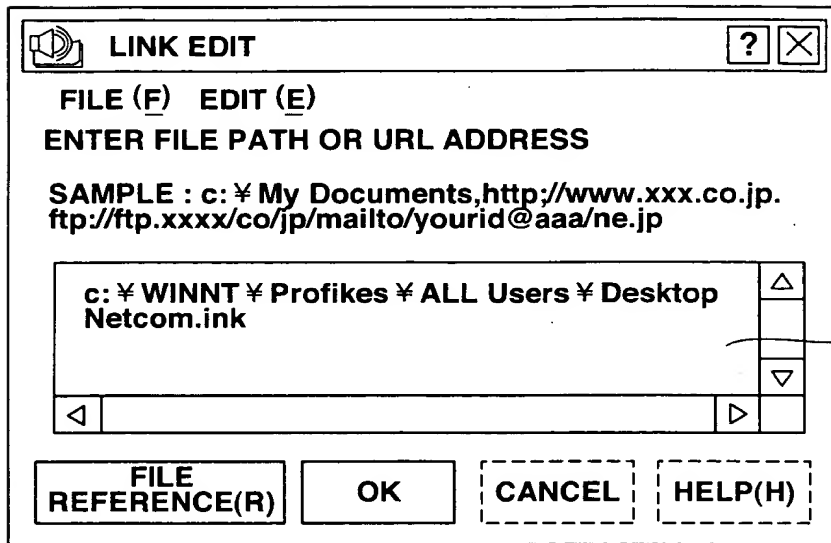


FIG.53

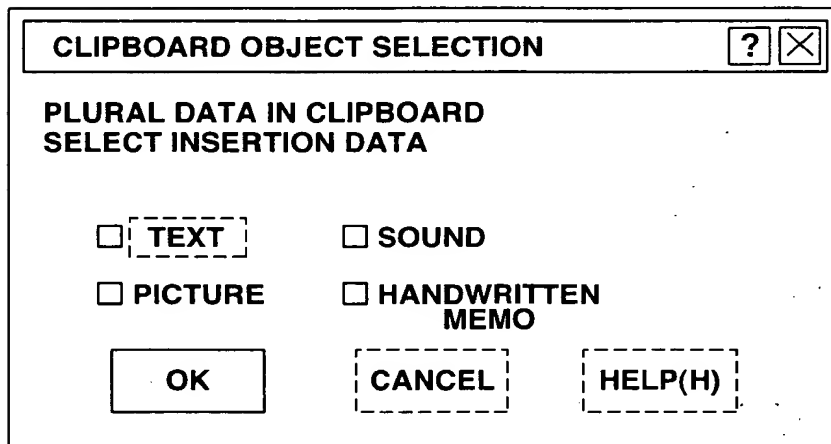


FIG.54

FIG.55

LABEL SOFTWARE SET			?	×
RECORD SET	PICTURE SET	ENVIRONMENT SET		
LABEL SET				
LABEL SIZE			DEFAULT	
HORIZONTAL:	250	▲ ▼	VERTICAL:	92 ▲ ▼
			SAMPLE DISPLAY	
TEXT MARGIN				
LEFT:	8	▲ ▼	TOP:	24 ▲ ▼
			RIGHT:	8 ▲ ▼
BIT MAP MARGIN				
LEFT:	8	▲ ▼	TOP:	25 ▲ ▼
			RIGHT:	8 ▲ ▼
<input checked="" type="checkbox"/> DO NOT OVERLAP TEXT AND BIT MAP				
SET SIZE CHANGE				
<input checked="" type="checkbox"/> RE-LAYOUT (R)				
<input checked="" type="checkbox"/> KEEP BIT MAP ASPECT RATIO (F)				
OK CANCEL DELETE HELP				

FIG.56


[illegible]

FIG.58

ALARM

?

×

 TIME IS THAT AS SET ON LABEL

ALARM TIME : 04/02/1999 10:51:12
 LABEL PREPARING TIME : 04/02/1999 10:51:12

☐ ERASE THIS ALARM
☒ RING THIS ALARM AGAIN AT TIME INDICATED BELOW

ALARM SET

0

▲

▼

0

▲

▼

☒
☐

ALARM TIME : 04/02/1999 10:51:12

☐ CLOSE DIALOG AND TIME VIEW LABEL PREPARINT TIME

OK

CANCEL

HELP (H)

FIG.59

DELETE PRESENT LABEL

×

SELECT OPERATION FROM LABEL END
 TIME SETTING OR LABEL DELETION

LABEL OREPATING TIME : 1999/05/11 15:58:05
 LABEL END TIME: 1999/05/12 16:50:50
 (OPERATION TIME)

☒ SET OPERATIONTIME TO END TIME
☐ DELETE AT PRESENT TIME

OK

CANCEL

HELP (H)

FIG.60

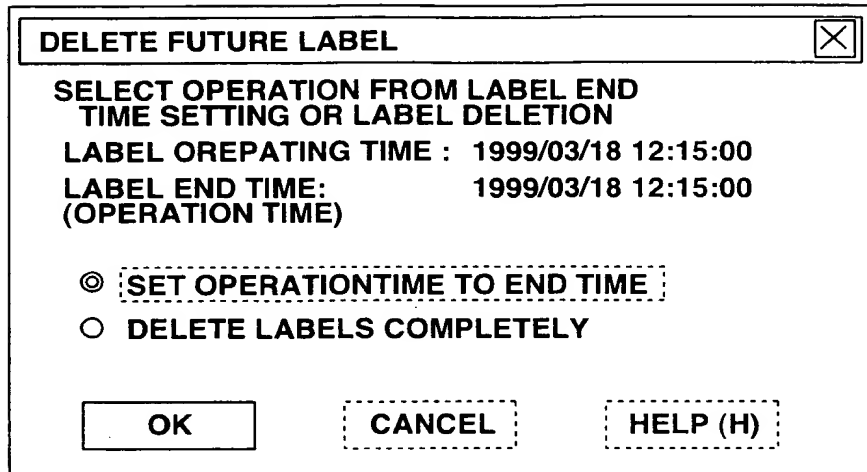


FIG.61

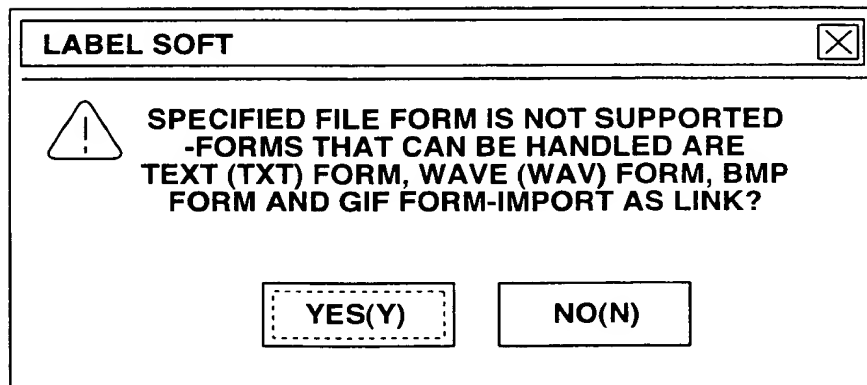


FIG.62

SET LABEL SOFTWARE			?	✕	
SOUND RECORD SET		PICTURE SET		ENVIRONMENT SET	
LABEL SET		DEFAULT LABEL LAYOUT			
----- SET DEFAULT LABEL -----					
<div style="border: 1px dashed black; padding: 5px; display: inline-block;"><div style="border: 1px solid black; padding: 5px; display: inline-block;">BACKGROUND COLOR (B)</div></div>		<input checked="" type="checkbox"/> WARD OVERLAP			
<div style="border: 1px solid black; padding: 5px; display: inline-block;">FONT (F)</div>		<input checked="" type="checkbox"/> DISPLAY PREPARING DATE AND TIME			
<div style="border: 1px dashed black; padding: 20px; margin: 10px auto; width: 80%;">-----</div> <div style="border: 1px solid black; padding: 10px; margin: 10px auto; width: 60%; text-align: center;">04/01/1999 21:00:00 ABC DEF GHI JKL</div>					
<input checked="" type="checkbox"/> BACKGROUND COLOR APPLY ONLY TO TEXT					
<div style="border: 1px dashed black; padding: 20px; margin: 10px auto; width: 80%; height: 100px;"></div>					

<div style="border: 1px solid black; padding: 5px; display: inline-block;">OK</div>		<div style="border: 1px dashed black; padding: 5px; display: inline-block;">CANCEL</div>		<div style="border: 1px dashed black; padding: 5px; display: inline-block;">DELETE</div>	
				<div style="border: 1px dashed black; padding: 5px; display: inline-block;">HELP</div>	

FIG.65

FIG.66

FIG.67

SET LABEL SOFTWARE

LABEL SET

DEFAULT LABEL LAYOUT

SOUND RECORD SET

PICTURE SET

ENVIRONMENT SET

OPERATION ON DOUBLE-CLICKING TASK TRAY ICON

ADD NEW LABEL

☒ REGISTER IN STARTUP MENU

TIME INCREASING/DECREASING INTERVAL

☒ 100 YEARS
 ☒ 1 HOUR

☒ 10 YEARS
 ☒ 1 MIN

☒ 1 YEARS
 ☒ 1 SEC

☒ 1 MONTH
 ☒ CHANGE POINT

☒ 1 DAY

OK

CANCEL

DELETE

HELP

FIG.68

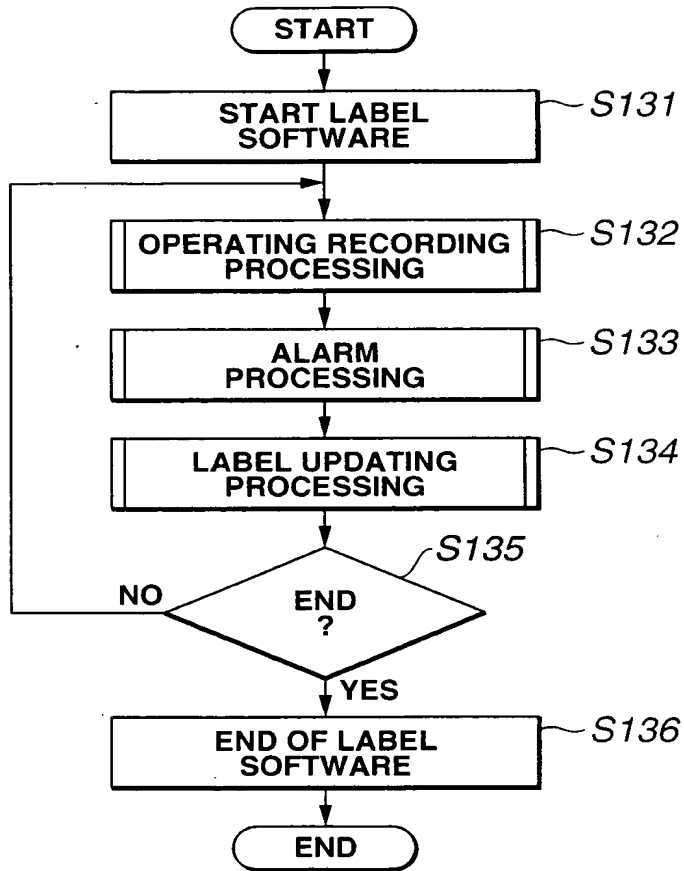


FIG.69

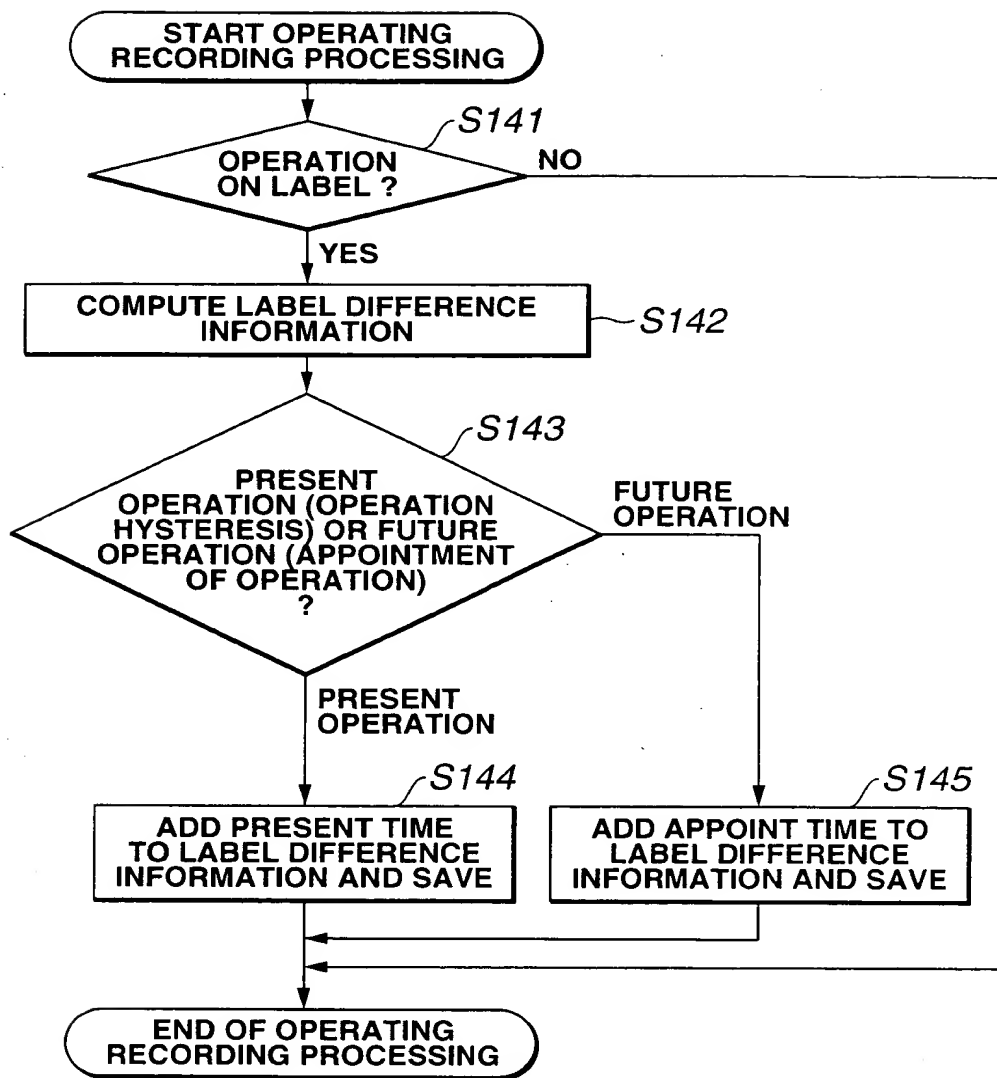


FIG.70

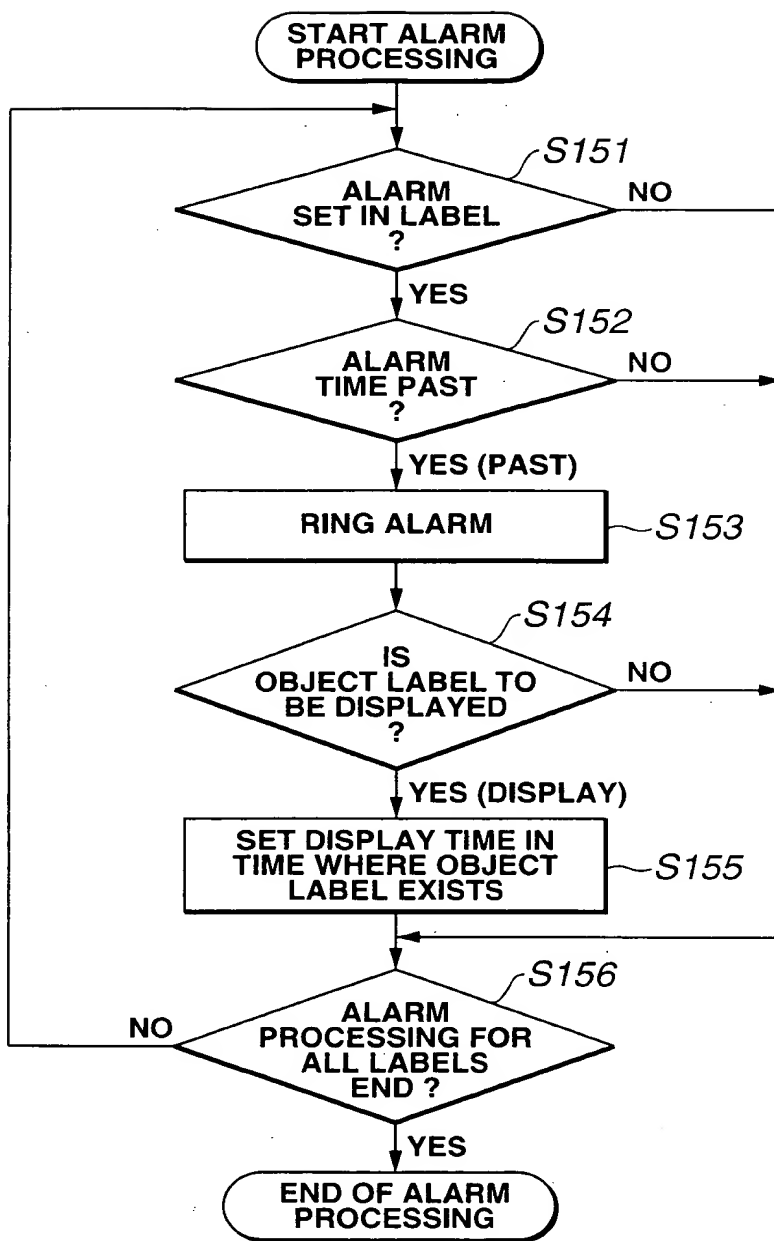


FIG.71

```

graph TD
    Start([START LABEL UPDATING]) --> S161{LABEL SET FOR REPETITION?}
    S161 -- YES --> S162[ LABEL REPEAT PROCESSING ]
    S161 -- NO --> S163{CURRENT STATE DISPLAYED?}
    S162 --> S163
    S163 -- YES(PRESENT) --> S164[ SET DISPLAY TIME TO PRESENT TIME ]
    S163 -- NO (PAST OR FUTURE) --> S165[ SET DISPLAY TIME TO USER SPECIFIED TIME ]
    S164 --> S166[ DISPLAY LABEL STATE OF SET DISPLAY TIME ]
    S165 --> S166
    S166 --> End([END OF LABEL UPDATING])
  
```

FIG.72

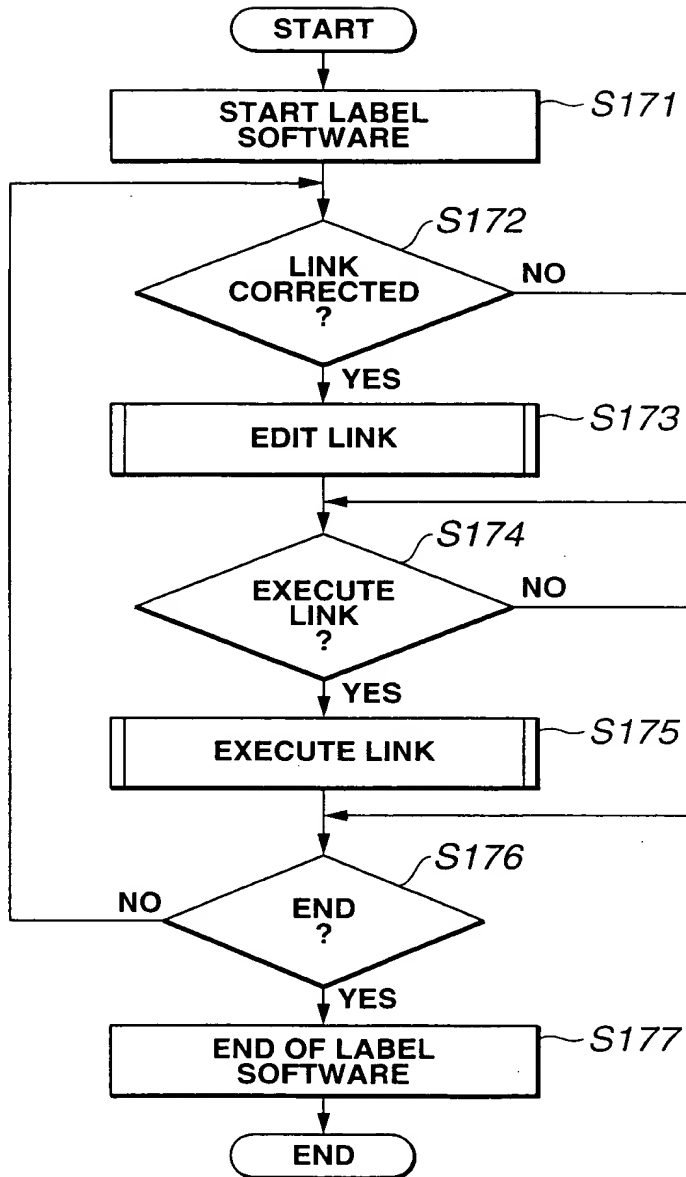


FIG.73

```

graph TD
    Start([START LINK EDITING]) --> S181{DRAG AND DROP?}
    S181 -- YES --> S183[SAVE DROPPED FILE PATH AND URL AS LINK]
    S181 -- NO --> S182[DISPLAY LINK EDITING DIALOG]
    S182 --> S143{LINK ENTERED OR REFERRED?}
    S143 -- LINK ENTERED --> S187[SAVE ENTERED FILE PATH AND URL AS LINK]
    S143 -- REFER TO LINK --> S185[DISPLAY LINK EDITING DIALOG]
    S185 --> S186[SAVE REFERENCED FILE PATH AND URL AS LINK]
    S183 --> End([END OF LINK EDITING])
    S187 --> End
    S186 --> End

```

FIG.74

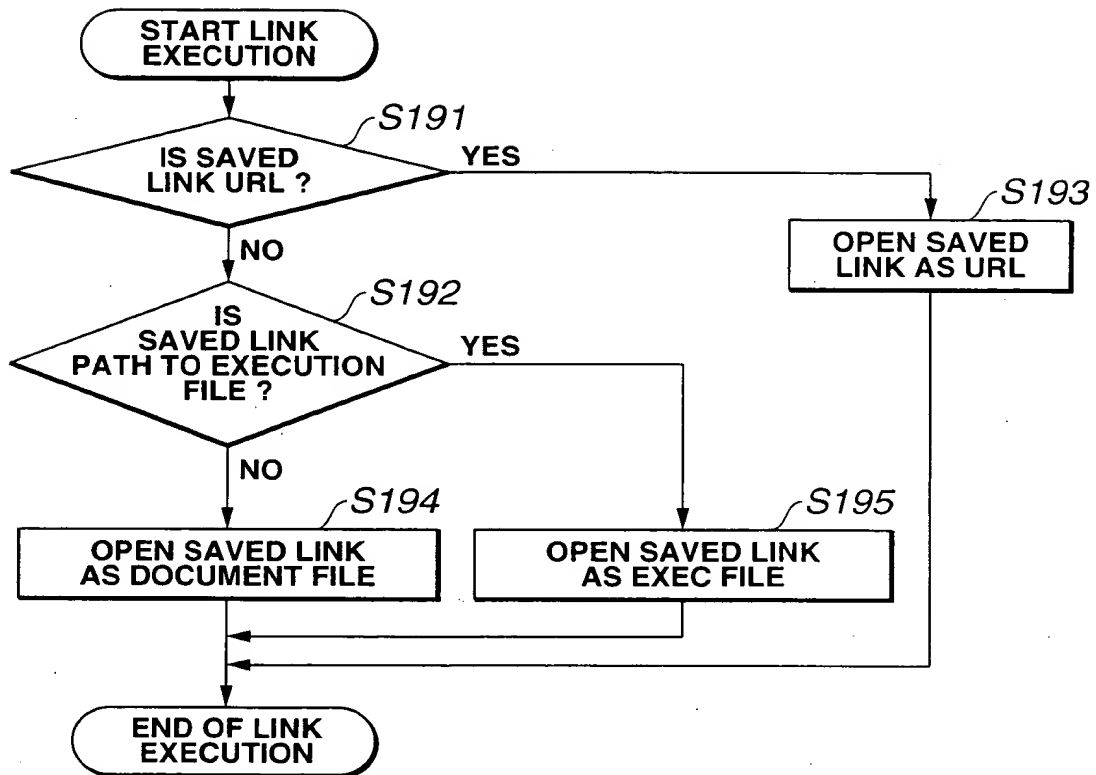


FIG.75

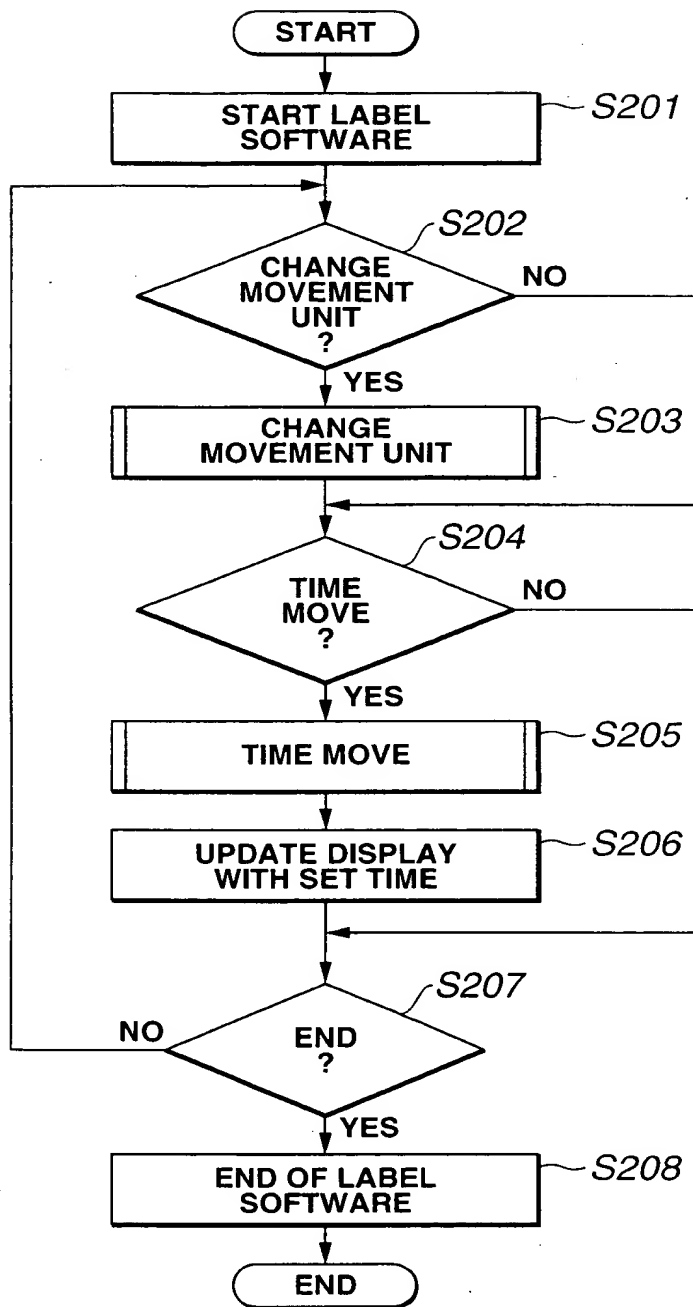
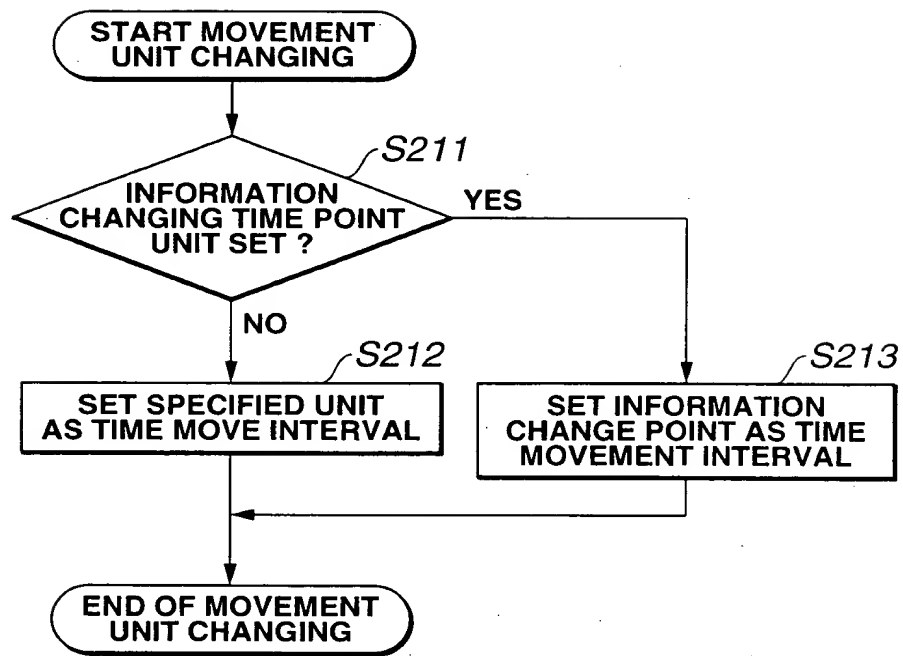


FIG.76



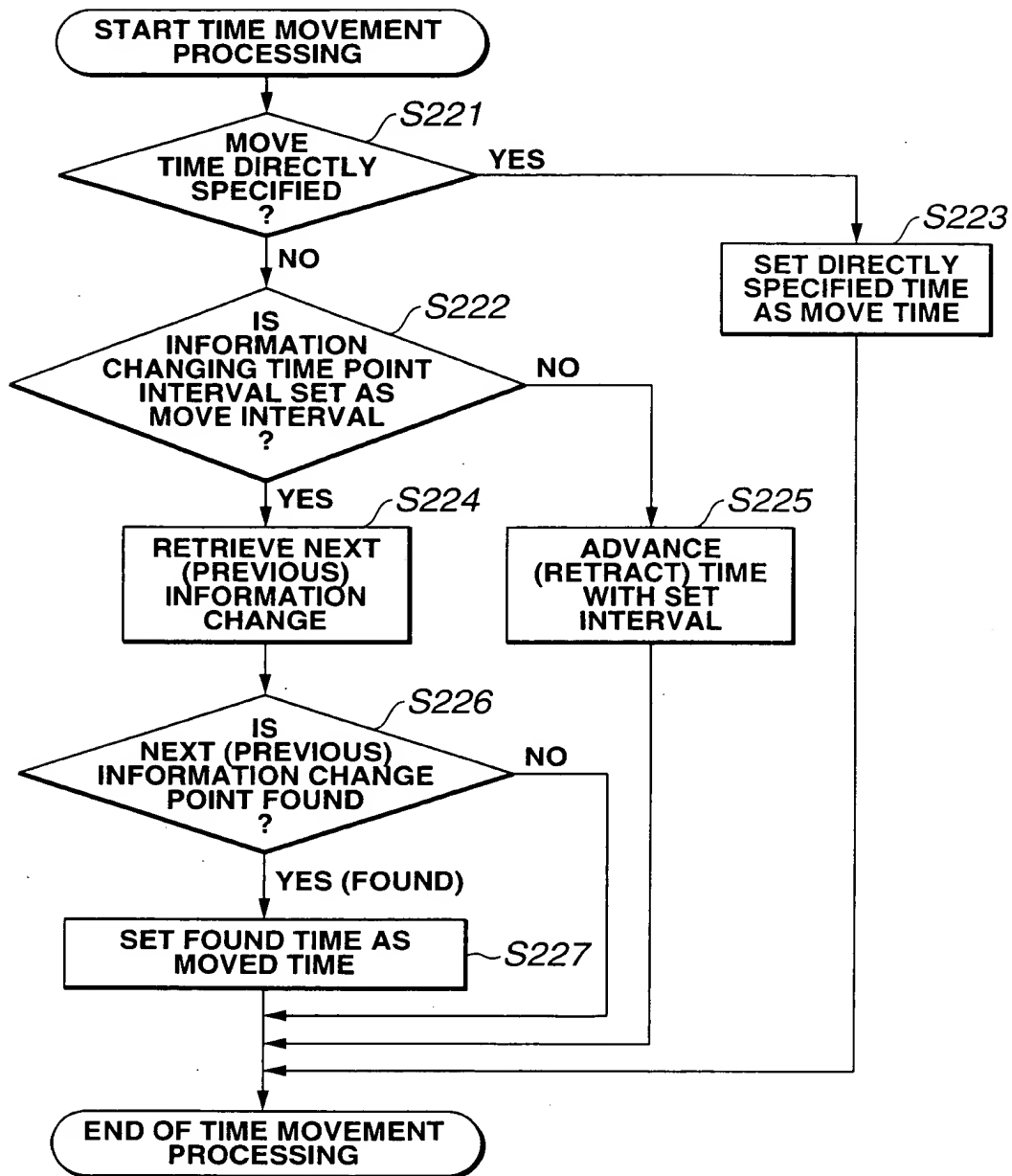


FIG.78

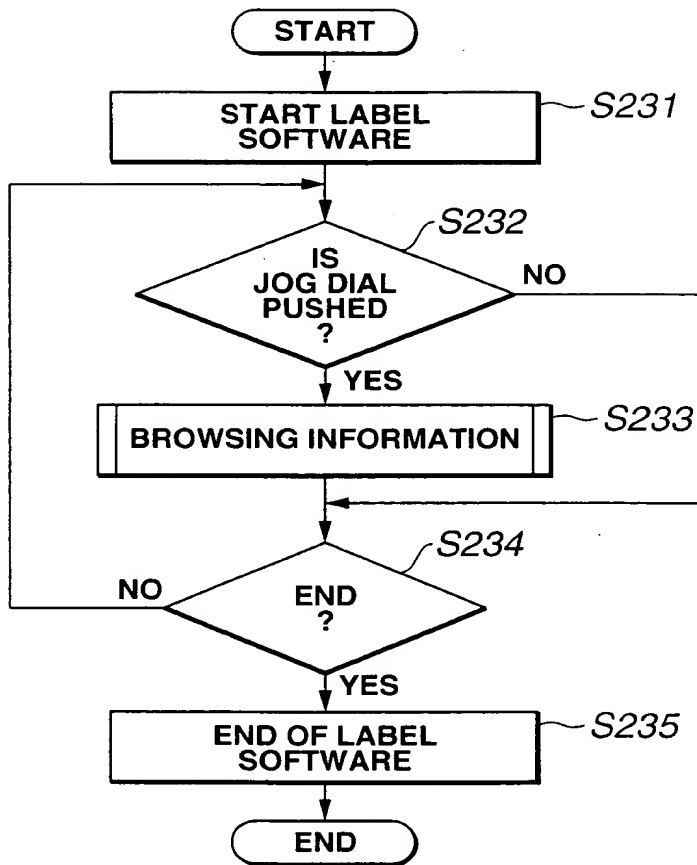


FIG.79

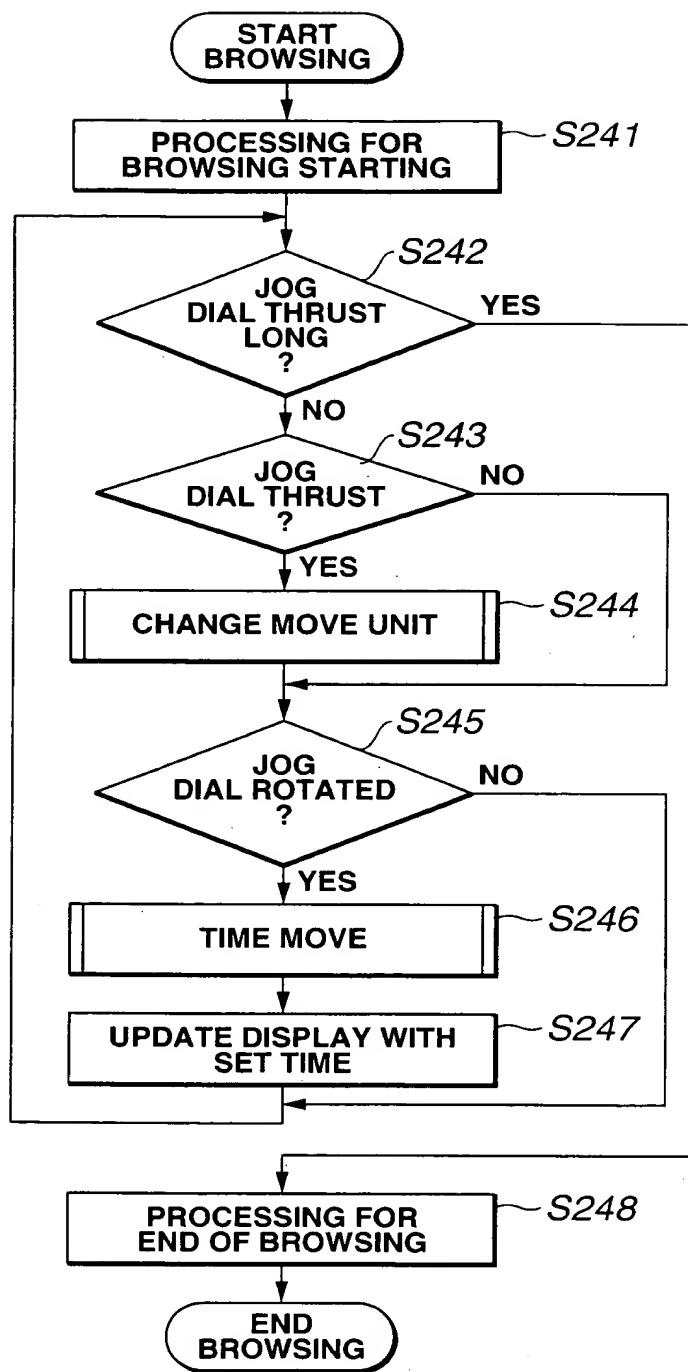


FIG.80

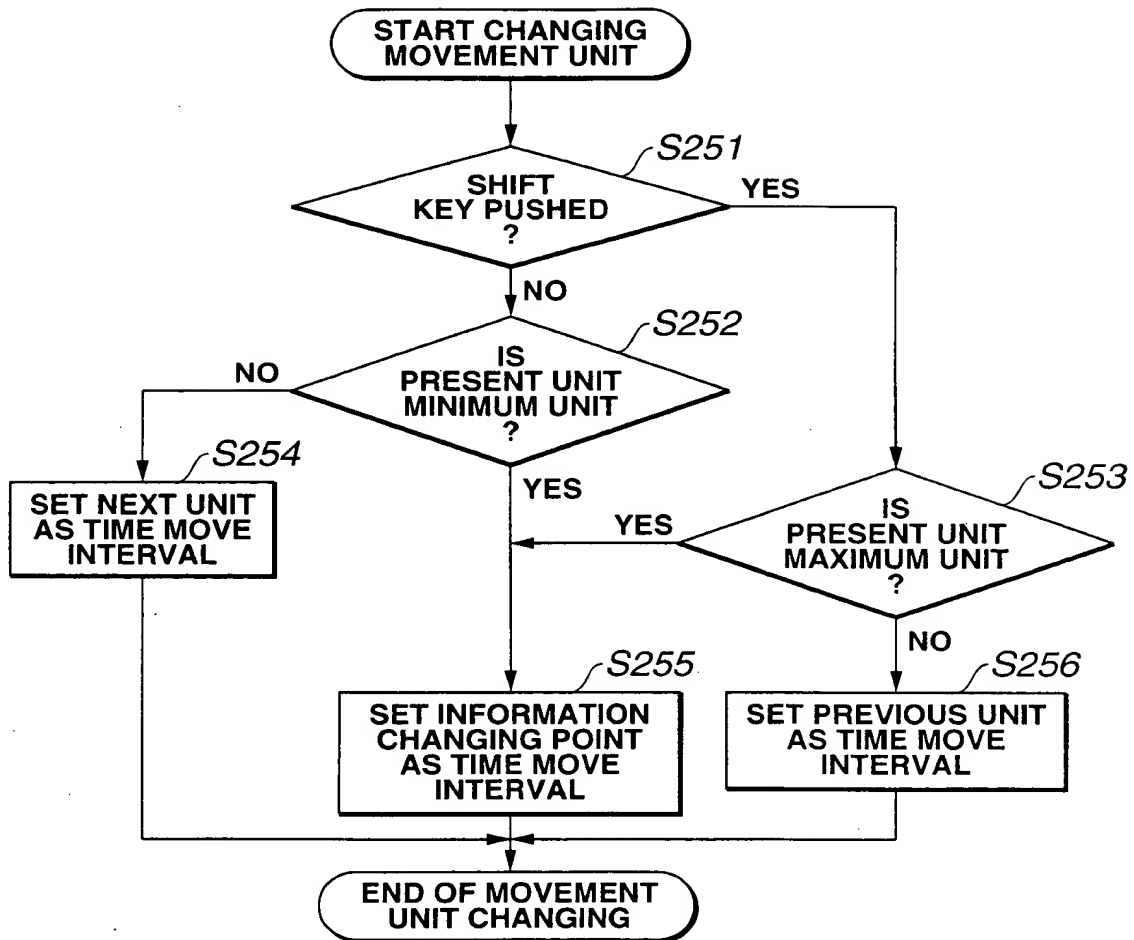


FIG.81

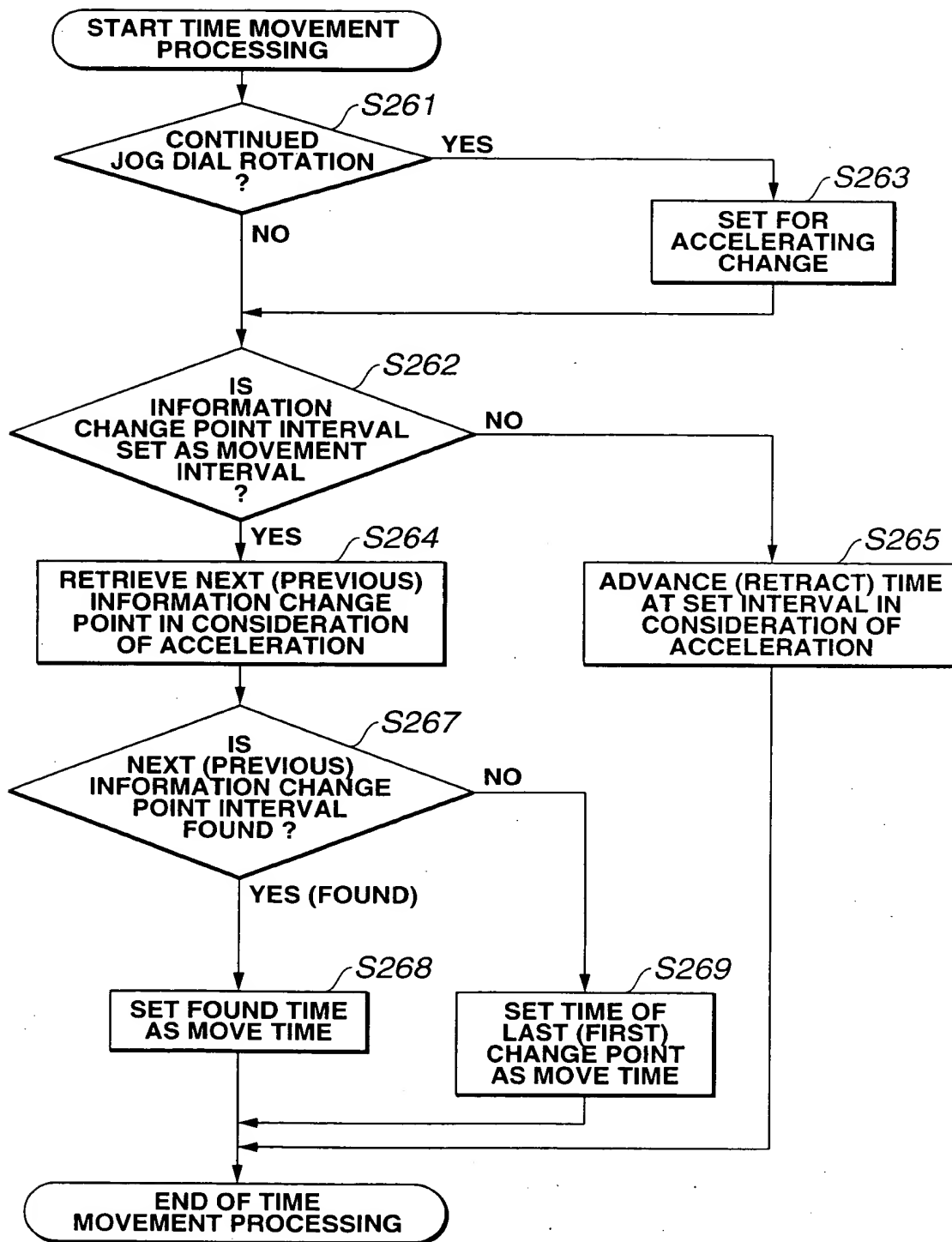


FIG.82

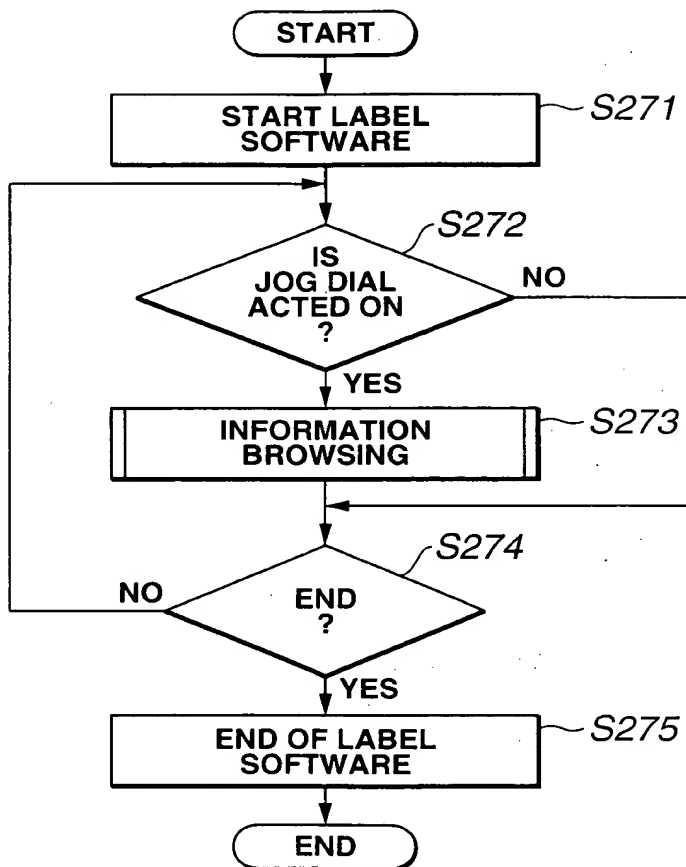


FIG.83

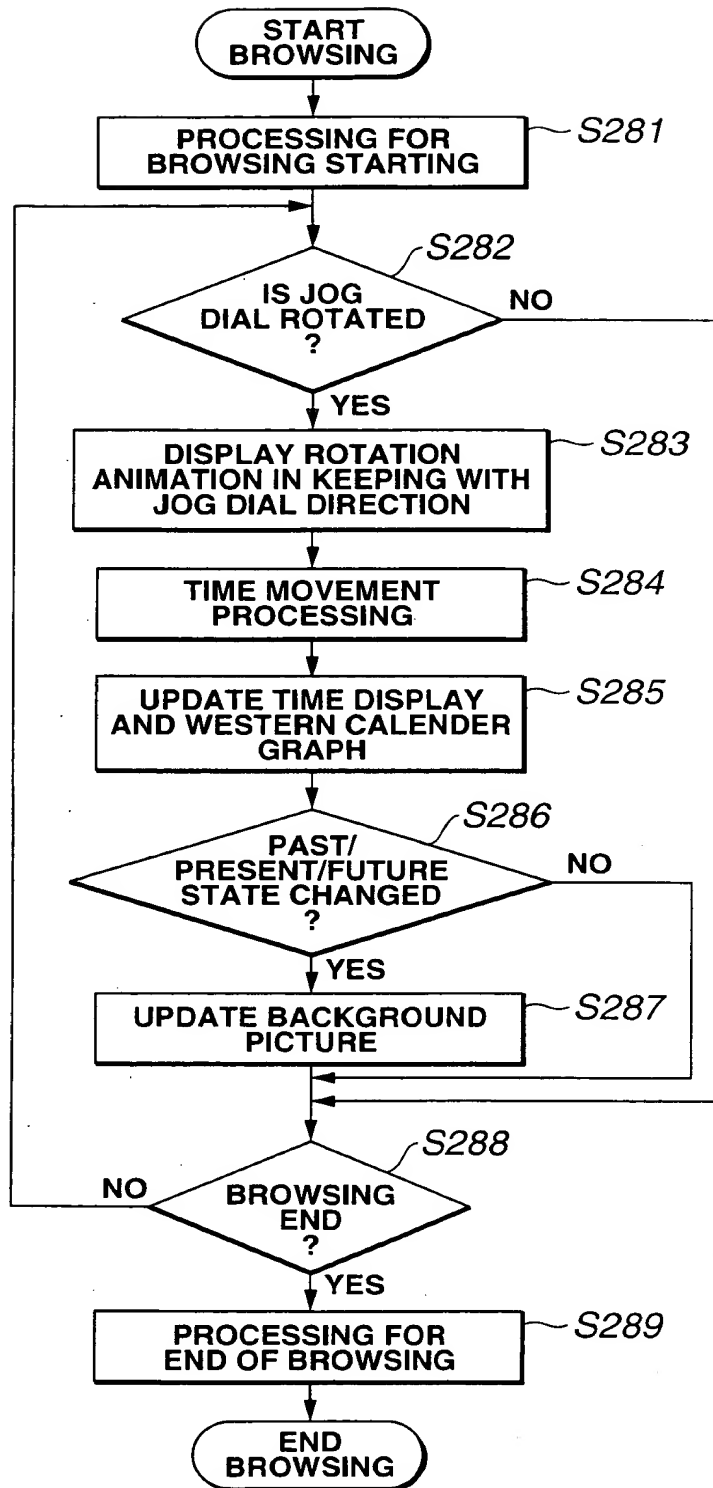


FIG.84

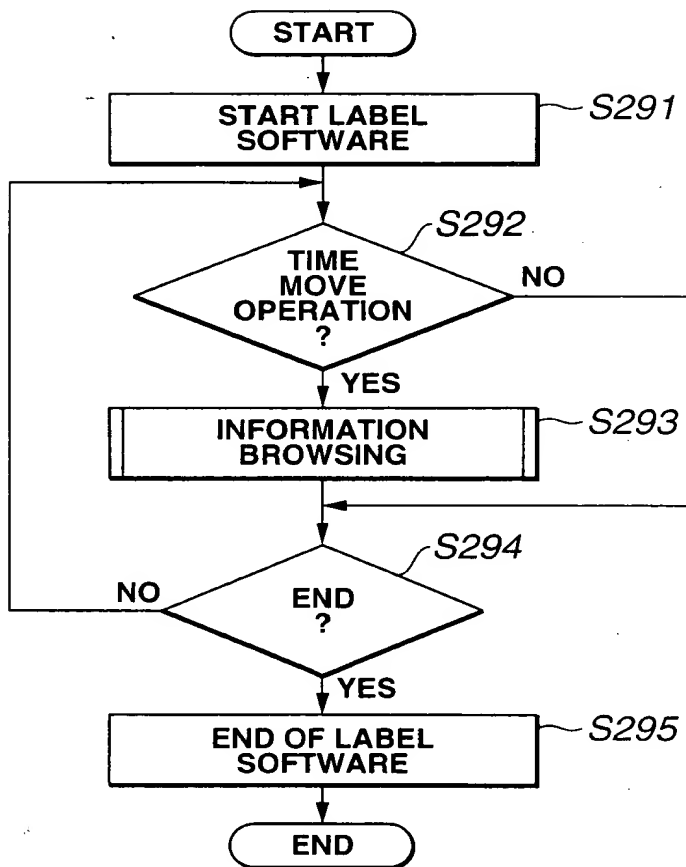


FIG.85

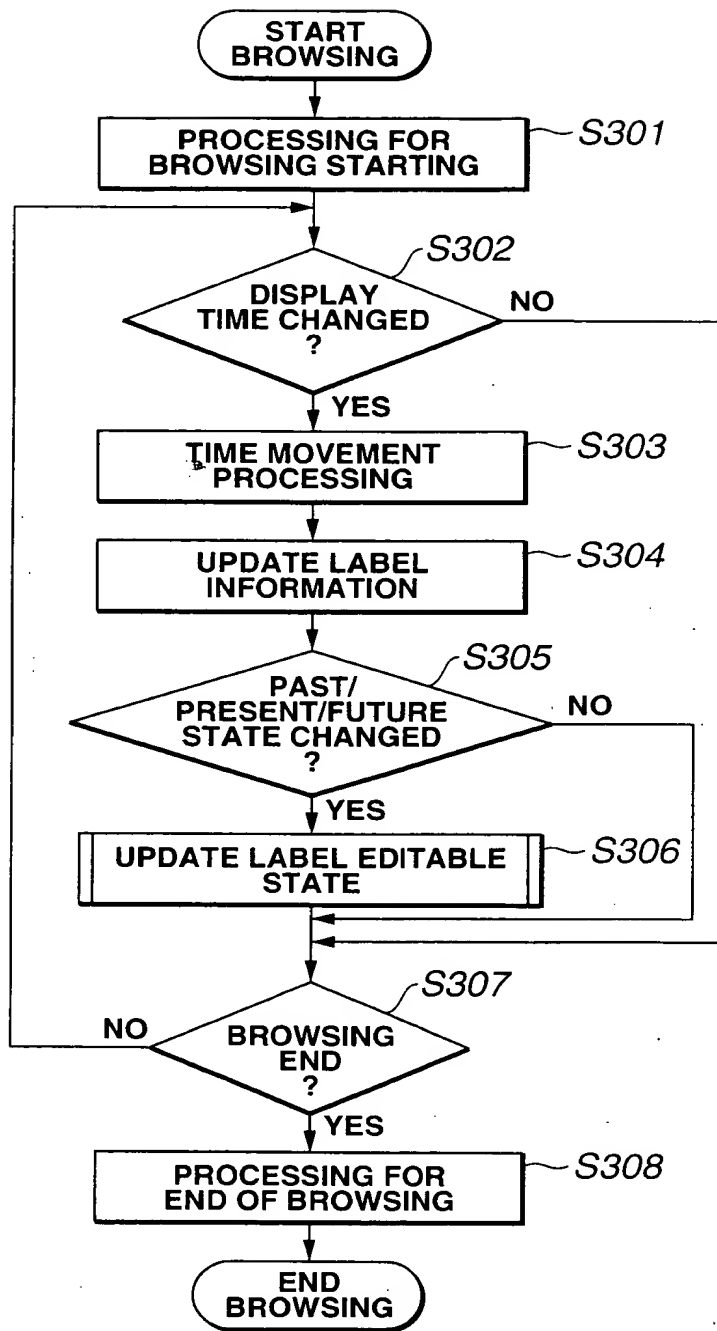


FIG.86

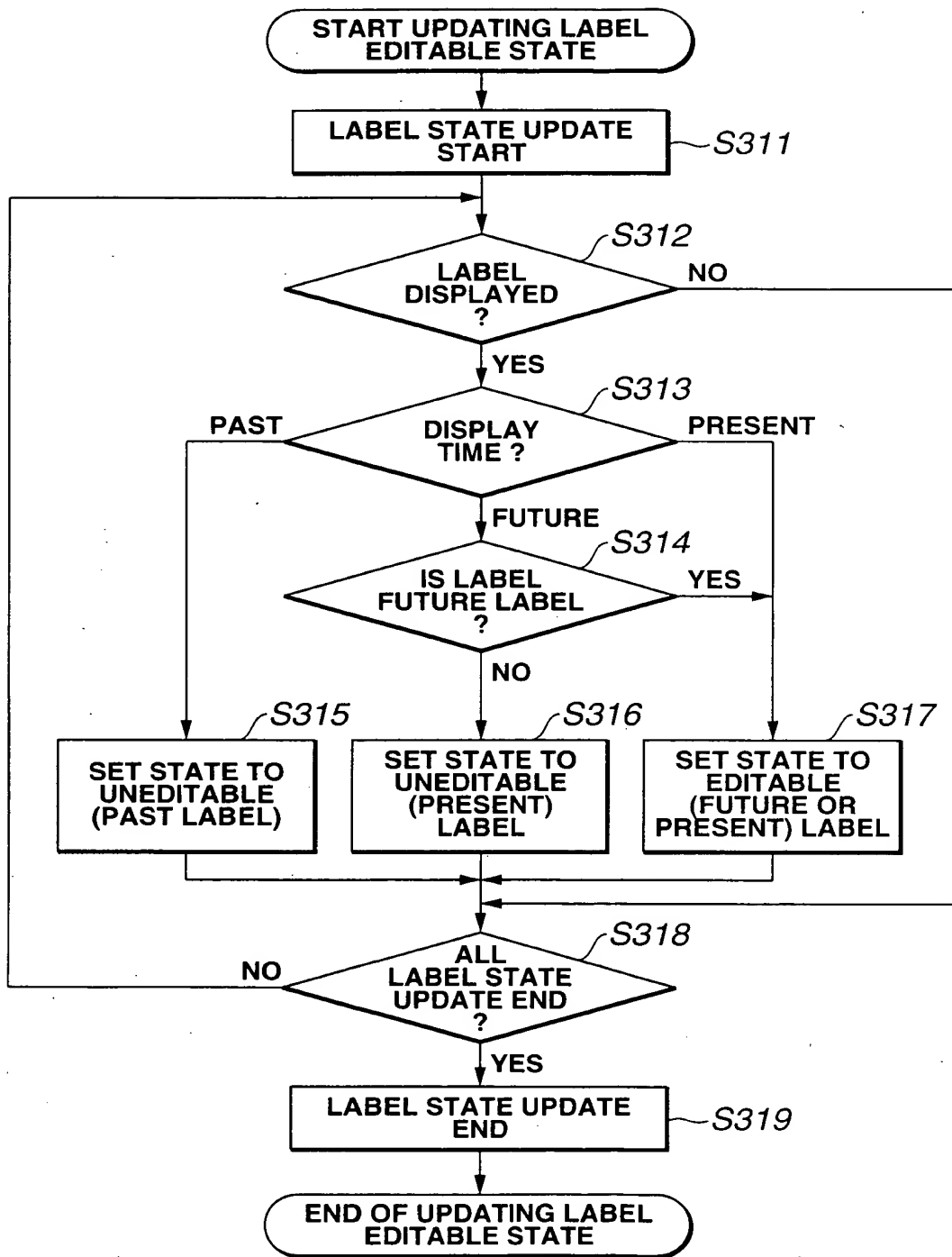


FIG.87

```
graph TD; START([START]) --> S321[START LABEL SOFTWARE]; S321 --> S322{BROWSING START?}; S322 -- YES --> S323[INFORMATION BROWSING]; S323 --> S324{END?}; S324 -- YES --> S325[END OF LABEL SOFTWARE]; S325 --> END([END]); S324 -- NO --> S322;
```

The flowchart illustrates the process of label software. It begins with a 'START' terminal, leading to a process block 'START LABEL SOFTWARE' (S321). This leads to a decision diamond 'BROWSING START?' (S322). If the answer is 'YES', the process continues to 'INFORMATION BROWSING' (S323). If the answer is 'NO', the process loops back to the entry point before the 'BROWSING START?' decision. From 'INFORMATION BROWSING', the process moves to another decision diamond 'END?' (S324). If the answer is 'YES', the process proceeds to 'END OF LABEL SOFTWARE' (S325) and finally to the 'END' terminal. If the answer is 'NO', the process loops back to the entry point before the 'END?' decision.

FIG. 88

```

graph TD
    Start([START BROWSING]) --> S331[START BROWSING PROCESSING S331]
    S331 --> S332{DISPLAY TIME CHANGED? S332}
    S332 -- YES --> S333[TIME MOVEMENT PROCESSING S333]
    S332 -- NO --> S334{IS PRESENT BUTTON PUSHED? S334}
    S333 --> S334
    S334 -- YES --> S335[SET DISPLAY TIME TO PRESENT S335]
    S334 -- NO --> S336{BROWSING END? S336}
    S335 --> S336
    S336 -- YES --> S337[BROWSING END PROCESSING S337]
    S336 -- NO --> S332
    S337 --> End([END OF BROWSING])
  
```

FIG.89

```

graph TD
    START([START]) --> S341[START LABEL SOFTWARE]
    S341 --> S342{ALL LABELS NOT DISPLAYED?}
    S342 -- YES --> S343[SET NON-DISPLAY ICON]
    S342 -- NO --> S344[SET USUAL ICON]
    S343 --> S345{BROWSING START?}
    S344 --> S345
    S345 -- YES --> S346[INFORMATION BROWSING]
    S345 -- NO --> S347{END?}
    S346 --> S347
    S347 -- YES --> S348[END OF LABEL SOFTWARE]
    S347 -- NO --> S342
    S348 --> END([END])
  
```

FIG.90

```

graph TD
    Start([START BROWSING]) --> S351[PROCESSING FOR BROWSING STARTING]
    S351 --> S352{DISPLAY TIME CHANGED?}
    S352 -- NO --> S357{BROWSING END?}
    S352 -- YES --> S353[TIME MOVEMENT PROCESSING]
    S353 --> S354[UPDATE LABEL INFORMATION]
    S354 --> S355{PAST/PRESENT/FUTURE STATE CHANGED?}
    S355 -- NO --> S357
    S355 -- YES --> S356[UPDATE TASK TRAY ICON]
    S356 --> S357
    S357 -- NO --> S352
    S357 -- YES --> S358[PROCESSING FOR END OF BROWSING]
    S358 --> End([END BROWSING])
  
```

FIG.91

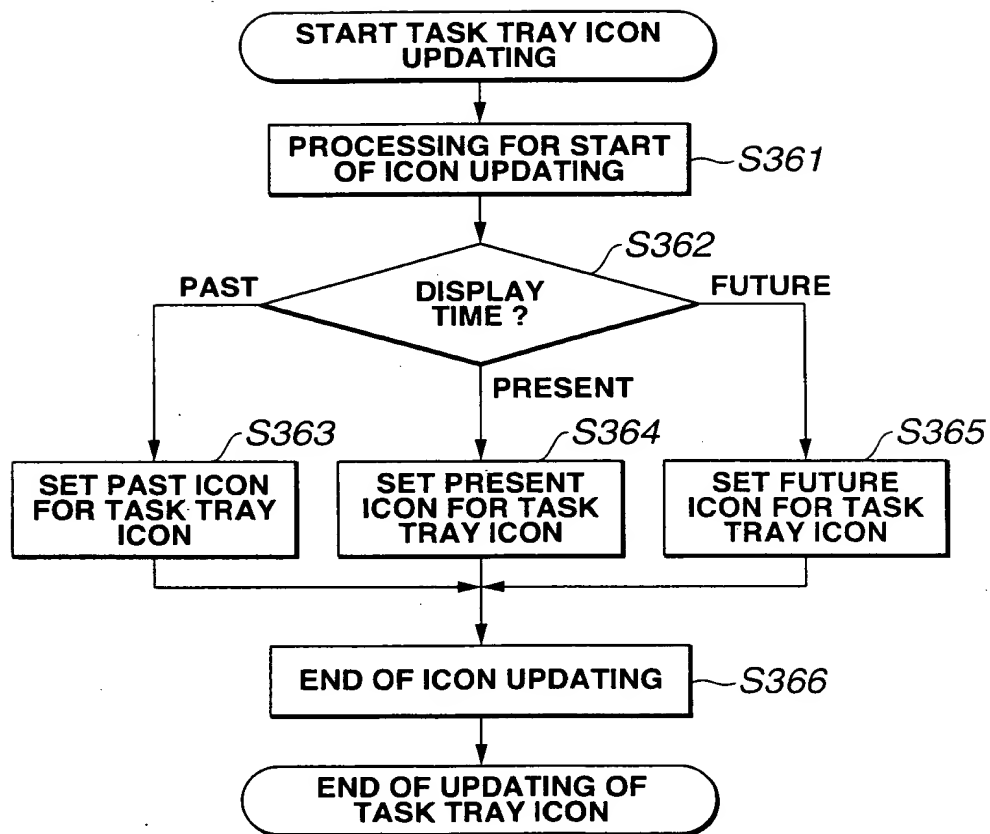


FIG.92